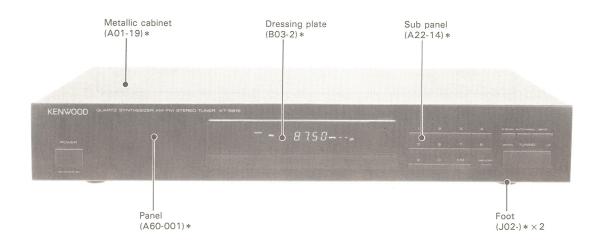
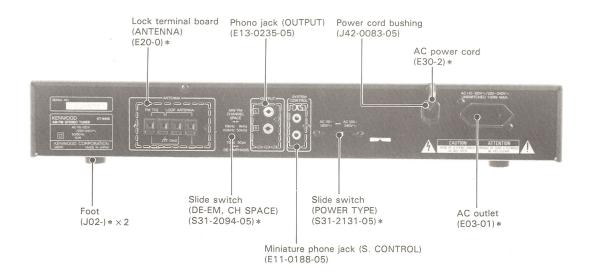
FM/AM STEREO SYNTHESIZER TUNER

KT-591/591S/1030L SERVICE MANUAL

KENWOO

©1991-1 PRINTED IN JAPAN B51-4284-00(T) 3753





KT-591 : K, P, Y, X type KT-591S : M type KT-1030L: T, E type

^{*} Refer to Parts List on page 34. Photo is KT-591S.

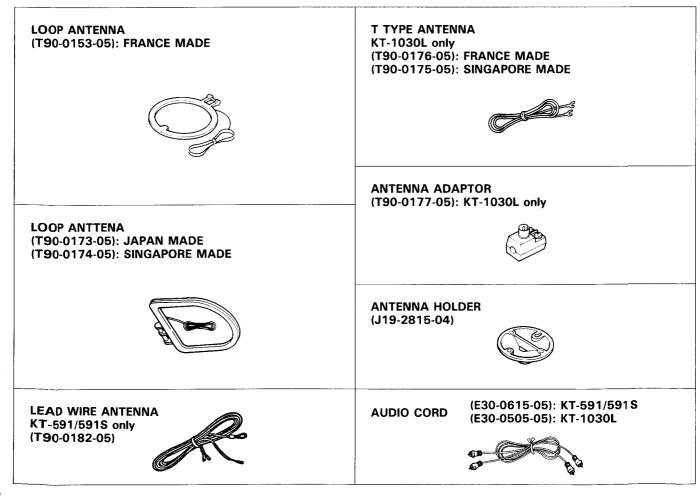
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(KT-591/1030L: COMPONENT SIDE VIEW)	1	SPECIFICATIONS	ack cove

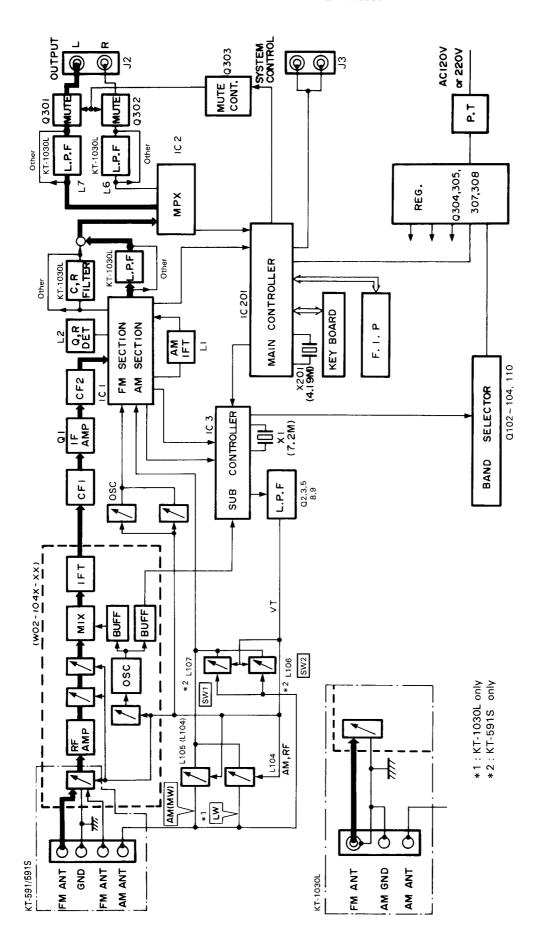
	JAPAN MADE	SINGAPORE MADE	FRANCE MADE
KT-591	X05-4040-10 (K,P) X05-4042-91 (Y) X05-4040-71 (X)	X05-4050-10 (K)	
KT-591S	X05-4060-20 (M)		
KT-1030L		X05-4050-51 (T) X05-4052-71 (E)	X05-4042-71 (E)

The KT-591 and KT-1030L are made in different countries. However, their circuits are identical.

ACCESSORIES



BLOCK DIAGRAM



CIRCUIT DESCRIPTION

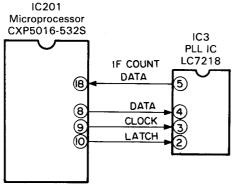
1. FEATURES

(1) Receiving bands

The unit is capable of receiving five bands; FM, AM (MW), LW, SW1 and SW2. The PLL IC is either LC7218 or LM7001 depending on whether SW (short wave) bands is to be received or not.

For details, refer to the table showing models according to the destinations (Table 1).

(2) IF count (when LC7218 is used)



When microcomputer pin SD goes low after the microcomputer has sent frequency data to the PLL, the IF count start data is sent to the PLL, which then starts counting the IF. When the microcomputer receives the IF count end signal from the PLL, the microcomputer reads IF count data from the PLL.

For MW/SW reception, the microcomputer identifies the receiving condition when the data becomes 450 kHz, sends the frequency data again to the PLL, and turns MUTING OFF in 0.5 second.

The TUNED indicator is lighted when the IF count result becomes OK.

IF counting is performed twice during auto tuning.

(3) Auto tuning

The auto tuning starts when the UP or DOWN key is pressed while the AUTO indicator is lighted.

MUTING is set to ON during tuning.

Frequencies are scanned upward or downward at a rate of about 125 ms/step (or 500 ms/step at band edges) until the tuned condition (*), in which the scanning stops. (Pressing the UP key during upward tuning or pressing the DOWN key during downward tuning is invalid.)

MUTING is turned OFF in 0.5 second after the tuning has stopped.

(*) Tuned condition

Condition in which there is a broadcasting station and it is being received.

With LM7001 (PLL), the TUNED indicator lights up and tuned condition starts when pin SD goes Low. With LC7218 (PLL), the tuned condition starts in the same way as with LM7001 for the FM band. For the MW/SW bands, the tuned condition starts following the process described in "(2) IF count" above.

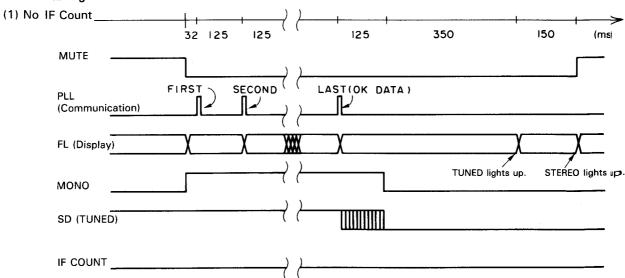
(4) Manual tuning

When the "AUTO" display is off, when the UP or DOWN key is pressed, the tuning operation goes in the direction of increasing or decreasing frequency at a rate of one step per key pressure.

When the UP or DOWN key is pressed continuously for more than 0.5 sec, the tuning operation continues in the direction of increasing or decreasing direction at a rate of 125 mses/step irrespective of the SD terminal level until the key is released from the finger pressure, after which 0.5 sec later, muting is turned OFF.

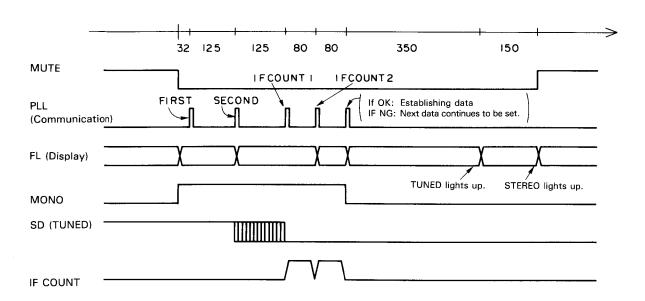
2. TIMING CHART

Auto tuning



CIRCUIT DESCRIPTION

(2) With IF count



3. Conditions by destination

	esti-	Dest	inatio	n swi	tches		Receiving frequency	Inter-channel			PLL	
1	tion /pe	3	2	1	0	Band	range	space (Hz)	IF	RF (Hz)	(IC)	
	 K1	0	0	1	0	FM	87.5~108.0 MHz	100 k	+ 10.7 MHz	50 k	L M7001	A A A A I
				'		AM	530~1610 kHz	10 k	+ 450 kHz	10 k	LM7001	AM Narrow
	K2	0	0	0	0	FM	87.5~108.0 MHz	100 k	+ 10.7 MHz	50 k	LM7001	0.04.00/: 1
К	KZ					AM	530~1700 kHz	10 k	+ 450 kHz	10 k	LM7001	AM Wide
`						FM	87.5~108.0 MHz	100 k	+ 10.7 MHz	50 k		
	К3	1	0	1	0	MW	530~1610 kHz	10 k	+ 450 kHz	10 k	LC7218	MAKAL CAAA
	I NO	'	0	'		SW1	3.2~7.3 MHz	5 k	+ 450 kHz	5 k	LC/218	With SW
						SW2	9.5~21.85 MHz	5 k	+ 450 kHz	5 k		
	F1	0	1	1	0	FM	87.5~108.0 MHz	50 k	+ 10.7 MHz	50 k	LM7001	
			I	'		AM	531~1603 kHz	9 k	+ 450 kHz	9 k	LM7001	
						FM	87.5~108.0 MHz	50 k	+ 10.7 MHz	50 k		
	E2	0	1	1	1	MW	531 ~ 1603 kHz	9 k	+ 450 kHz	9 k	LM7001	With LW
E						LW	153~281 kHz	1 k	+ 450 kHz	1 k		
						FM	87.5~108.0 MHz	50 k	+ 10.7 MHz	50 k		
	E3	1	1	1		MW	531 ~ 1603 kHz	9 k	+ 450 kHz	9 k	1.07010	14/54 0144
	E3		1		0	SW1	3.2~7.3 MHz	5 k	+ 450 kHz	5 k	LC7218	With SW
						SW2	9.5~21.85 MHz	5 k	+ 450 kHz	5 k		

(Table 1)

(*) BAND Selection (1: With diode/0: Without diode)

BAND 3 With SW/Without SW BAND 2 STEP 9 k, 50 k/10 k, 100 k

BAND 1 AM Narrow/Wide
BAND 0 With LW/Without LW

KT-591/591S/1030L

CIRCUIT DESCRIPTION

4. Initial status setting (reset)

(1) Method of setting

While pressing the MEMORY key, turn AC ON.

(2) Contents

① POWER: OFF
② MUTE: ON
③ Forced MONO: OFF
④ FL display: All off

(5) State: RAM state = All clear

Tuning mode = AUTO

Memory = Test frequency (Table 2)

Last band = FM

Last frequency = Lowermost limit of each band.

Last P. $CH = \begin{bmatrix} -- & ch \end{bmatrix}$

5. Test frequency

	K	T-591	KT-1030L	KT-591S
P.ch	FM 50 k/AM 9 k	FM 100 k/AM 10 k	With LW	With SW
01ch	FM 98.0 MHz	FM 98.0 MHz	FM 98.0 MHz	FM 98.0 MHz
02ch	FM 108.0 MHz	FM 108.0 MHz	FM 108.0 MHz	FM 108.0 MHz
03ch	AM 630 kHz	AM 620 kHz	AM 620 kHz	AM 620 kHz
04ch	AM 990 kHz	AM 990 kHz	AM 990 kHz	AM 990 kHz
05ch	AM 1440 kHz	AM 1440 kHz	AM 1440 kHz	AM 1440 kHz
06ch	AM 1602 kHz	AM 1610 kHz	AM 1610 kHz	AM 1610 kHz
07ch	FM 87.5 MHz	AM 1700 kHz (FM 87.5 MHz)	LW 162 kHz	FM 87.5 MHz
08ch	FM 87.5 MHz	FM 87.5 MHz	LW 216 kHz	SW1 5.0 MHz
09ch	FM 87.5 MHz	FM 87.5 MHz	LW 270 KHz	SW2 15.0 MHz
10ch	FM 89.1 MHz	FM 89.1 MHz	FM 89.1 MHz	FM 89.1 MHz
11ch	FM 87.5 MHz	FM 87.5 MHz	LW 281 kHz	SW1 3.2 MHz
12ch	FM 87.5 MHz	FM 87.5 MHz	FM 87.5 MHz	SW1 3.5 MHz
13ch	FM 87.5 MHz	FM 87.5 MHz	FM 87.5 MHz	SW1 5.0 MHz
14ch	FM 87.5 MHz	FM 87.5 MHz	FM 87.5 MHz	SW1 6.8 MHz
15ch	FM 87.5 MHz	FM 87.5 MHz	FM 87.5 MHz	SW1 7.3 MHz
16ch	FM 87.5 MHz	FM 87.5 MHz	FM 87.5 MHz	SW2 9.5 MHz
17ch	FM 87.5 MHz	FM 87.5 MHz	FM 87.5 MHz	SW2 10.0 MHz
18ch	FM 87.5 MHz	FM 87.5 MHz	FM 87.5 MHz	SW2 15.0 MHz
19ch	FM 87.5 MHz	FM 87.5 MHz	FM 87.5 MHz	SW2 18.5 MHz
20ch	FM 87.5 MHz	FM 87.5 MHz	FM 87.5 MHz	SW2 21.85 MHz

(Table 2)

6. Test mode

(1) Method of setting

While holding the DOWN key depressed, plug the AC power cord to the power outlet.

(2) Display of test mode

When the test mode is set, all FL tubes are lit up. The FL tubes are kept lit until there is a key entry which results in a change of the FL frequency display.

(3) Operations in test mode

The operations are basically the same as in normal operation modes. Only difference lies in the processing accompanying the +10 key and 0 key (numeric keys).

Namely, the preset channel definition method using the \pm 10 key and numeric keys is different in the test mode. The preset channels are divided into three groups as shown below.

{01 ch - 10 ch/0 - ch/-- ch} : Group 1 {11 ch - 20 ch/1 - ch} : Group 2 {21 ch - 30 ch/2 - ch} : Group 3 When the current channel is in group 1, the 1 to 9 keys represent "01 ch" to "09 ch", and the 0 key represent "10 ch". Change from group 1 to another group does not occur until the \pm 10 key is pressed.

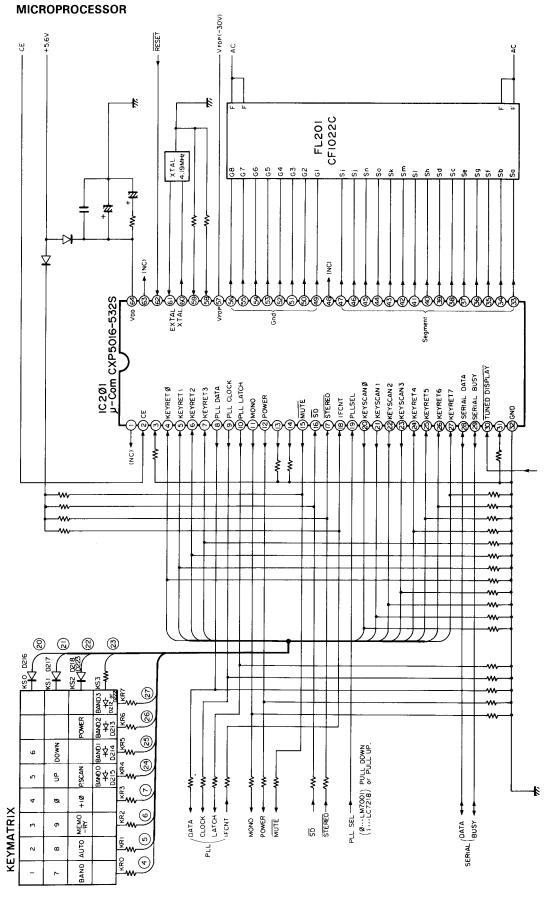
Pressing the + 10 key allows to change the group. When it is pressed while the current group is group 1, the display changes to "1- ch" and the current group is changed to group 2. Pressing the key while the current group is group 2 changes it to group 3 ("2- ch" display), and pressing the key while the current group is group 3 changes it to group 1 ("0- ch" display).

(4) Method of canceling

Unplug the AC power cord.

CIRCUIT DESCRIPTION

7. IC 201: CXP5016-532S



KT-591/591S/1030L

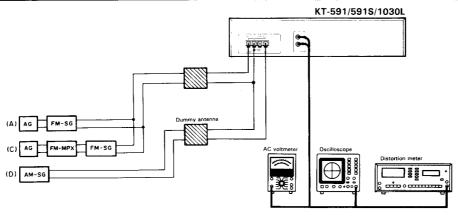
CIRCUIT DESCRIPTION

Pin functions

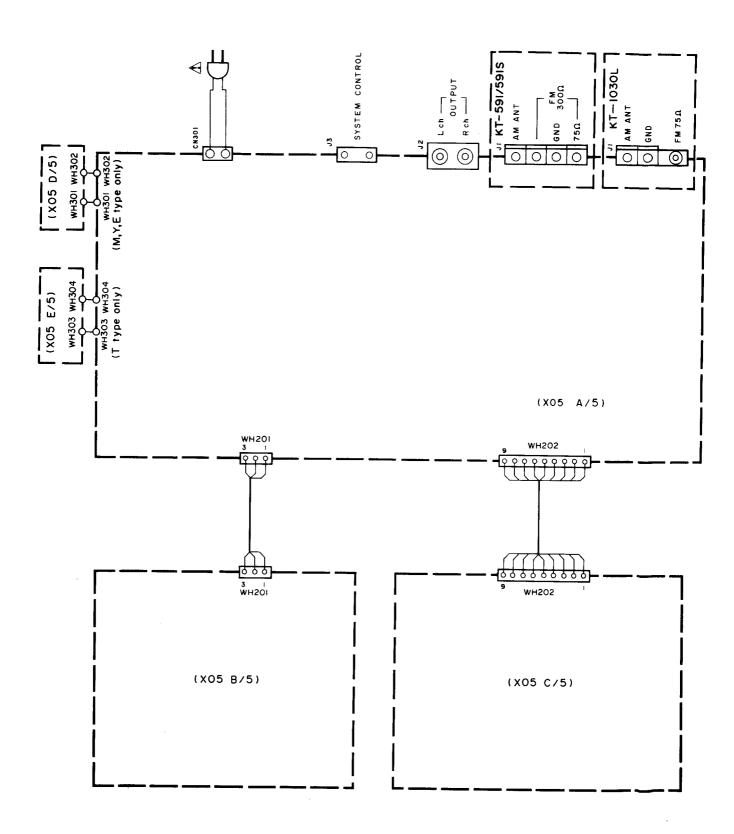
Pin No.	Pin name	I/O	Name	Operation description	
1	PWM/PY1	0		No used	
2	WP/PY2	1	CE	Chip enable pin.	Active low
3	RMC/EC/PY3	0		No use	
4~7			KR0~KR3	Key return input. KR0~KR3	
8	PD0	0	PLLDT	PLL DATA output	·
9	PD1	0	PLLCK	PLL CLOCK output	
10	PD2	0	PLLCE	PLL CE output	7,000,000,000,000,000,000,000,000,000,0
11	PD3	0	PMONO	Forced MONO output	H: ON L: OFF
12	PC0	0	PPOWER	Power ON/OFF control	H: ON L: OFF
13,14		0		No used	
15	PC3	0	PMUTE	Line mute	Active low
16	PEC	1	PSD	SD pin	Active low
17	PF1	1	PSTEREO	Stereo signal input	H: MONO L: STEREO
18	PF2	ı	PIFCNT	IF COUNT pin. On when IF count is finised	
19	PF3	ı	PLLSEL	PLL select pin	H: LC7218 L: LM7001
20~23	PEO~PE3	0	KS0~KS3	Key scan output KS0~KS3	
24~27	PB0~PB3	1	KR4~KR7	Key return input KR4~KR7	
28	PA0	I/O	SDATA	System control DATA	
29	PA1	1/0	SBUSY	System control BUSY	
30	PA2		PSDD DISP	"TUNED" display pin.	Active low
31	PA3	ı		No used	
32	Vss	_	GND	GND pin	***************************************
33~48		0	Sa~Sn	FDP segment Sa~Sn	
49~56		0	G1~G8	FDP grid G1~G8	
57	VFDP	_	VFDP	-30 V	
58,59		1		No used	
60	XTAL	0		Quartz oscillator output.	
61	EXTAL	ī		Quartz oscillator input.	
62	RST	1	RESET	Forced reset pin.	Active low
63	PYO	0		No used.	
64	VDD	_	VDD	Power supply.	

ADJUSTMENT

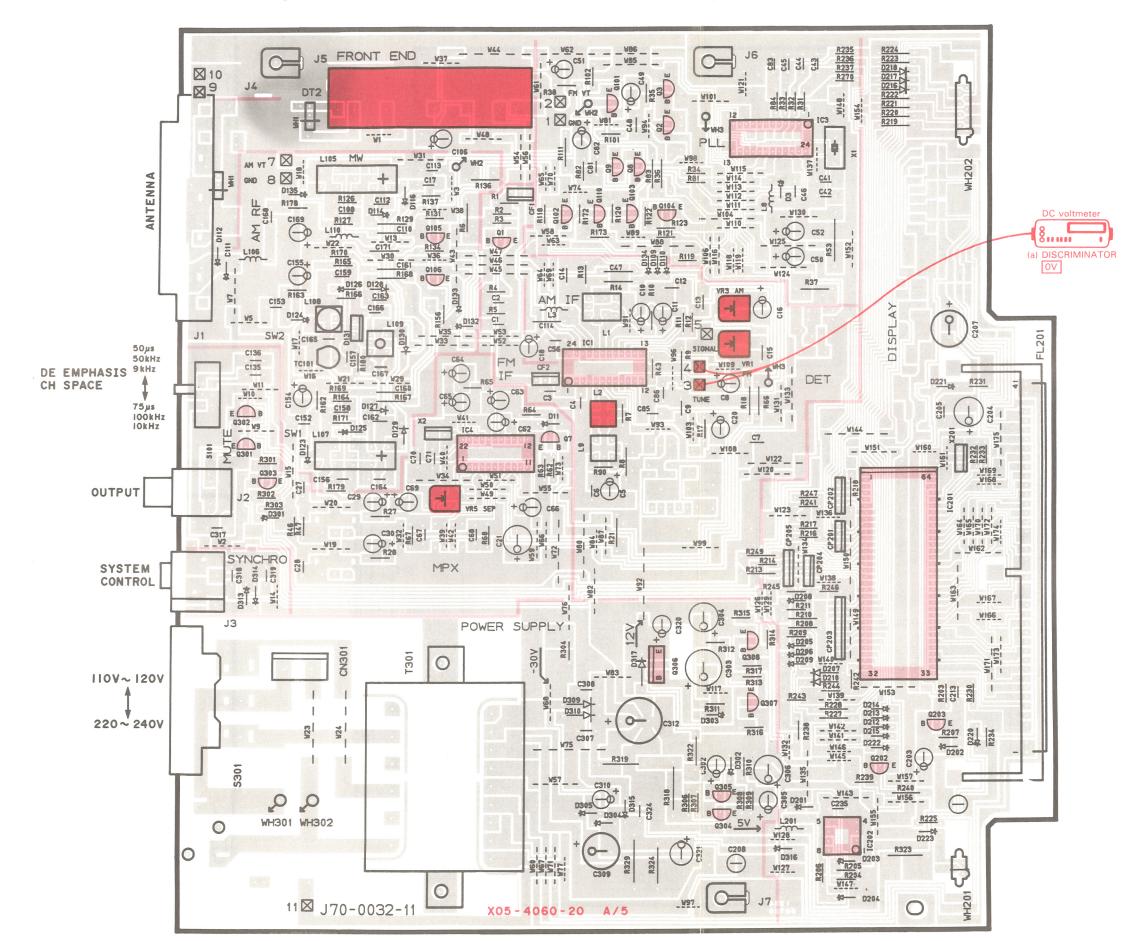
			OLIMBUM .	- Auron	Litianumm		
		INPUT	OUTPUT	TUNER	ALIGNMENT		
No.	I TEM	SETTINGS	SETTINGS	SETTINGS	POINTS	ALIGN FOR	FIG.
F M	SECTION		SELECTOR: FM	т	,	· · · · · · · · · · · · · · · · · · ·	
		(A) 98.0MHz 1kHz,±75kHz dev	Connect a DC voltmeter	AUTO	L2 (X05-)	ОУ	
1	DISCRIMINATOR	<pre></pre>	between TP3 and TP4. (X05-)	or MONO 98.0MHz	L9 (X05-) <kt-1030l only></kt-1030l 	Minimum distortion	(a)
		(A)	Connect a frequency				
2	vco	98.0MHz	counter to TP5 and	AUTO	VR2	19.00kHz	(ъ)
-	<kt-591 1030l<="" td=""><td>0 dev</td><td>TP6 (GND).</td><td>98.0MHz</td><td>(X05-)</td><td>10.00</td><td>(0)</td></kt-591>	0 dev	TP6 (GND).	98.0MHz	(X05-)	10.00	(0)
	only>	60dBμ (ANT input)	(X05-)	00.011112	(400)		
	ORTYZ	(C)	(100)		+		
3	DISTORTION (STEREO)	98.0MHz 1kHz,±68.25kHz dev Pilot:±7.5kHz dev <kt-591 591s=""></kt-591>	(B)	AUTO 98.0MHz	1FT (W02-)	Minimum distortion	
	(OT ENDO)	1kHz,±40kHz dev Pilot:±6kHz dev <kt-1030l> 60dBµ (ANT input)</kt-1030l>					
4	SEPARATION	(C) 98.0MHz 1kHz,±68.25kHz dev Pilot:±7.5kHz dev <kt-591s></kt-591s>		AUTO	VR5 (X05-) <kt-591s></kt-591s>		
	<kt-591s 1030l<br="">only></kt-591s>	lkHz,±40kHz dev Pilot ±6kHz dev <kt-1030l> Selector:L or R 60dBμ (ANT input)</kt-1030l>	(B)	98.0MHz	VR4 (X05-) <kt-1030l></kt-1030l>	Minimum crosstalk	
5	TUNING LEVEL	(A) 98.0MHz 1kHz,±75kHz dev <kt-591 591s=""> 1kHz,±45kHz dev <kt-1030l></kt-1030l></kt-591>	(B)	AUTO or MONO 98.0MHz	VR1 (X05-)	Adjust VRI and stop at the point where FL201(two dots) goes ON.	
		14dBμ(ANT input) 75Ω 18dBμ(ANT input)300Ω					
A M	(MW) SEI	LECTION	SELECTOR: AM(MW)		,		
(1)	TUNING LEVEL	(D) 1008kHz 400Hz.30% mod 26dBµ(ANT input)	(B)	1008kHz	VR3 (X05-)	Adjust VR3 and stop at the point where FL201(two dots)	

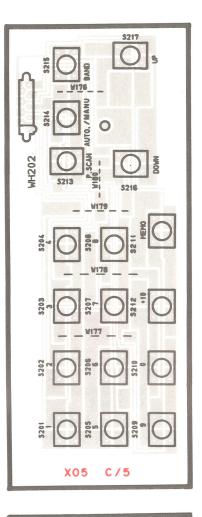


WIRING DIAGRAM



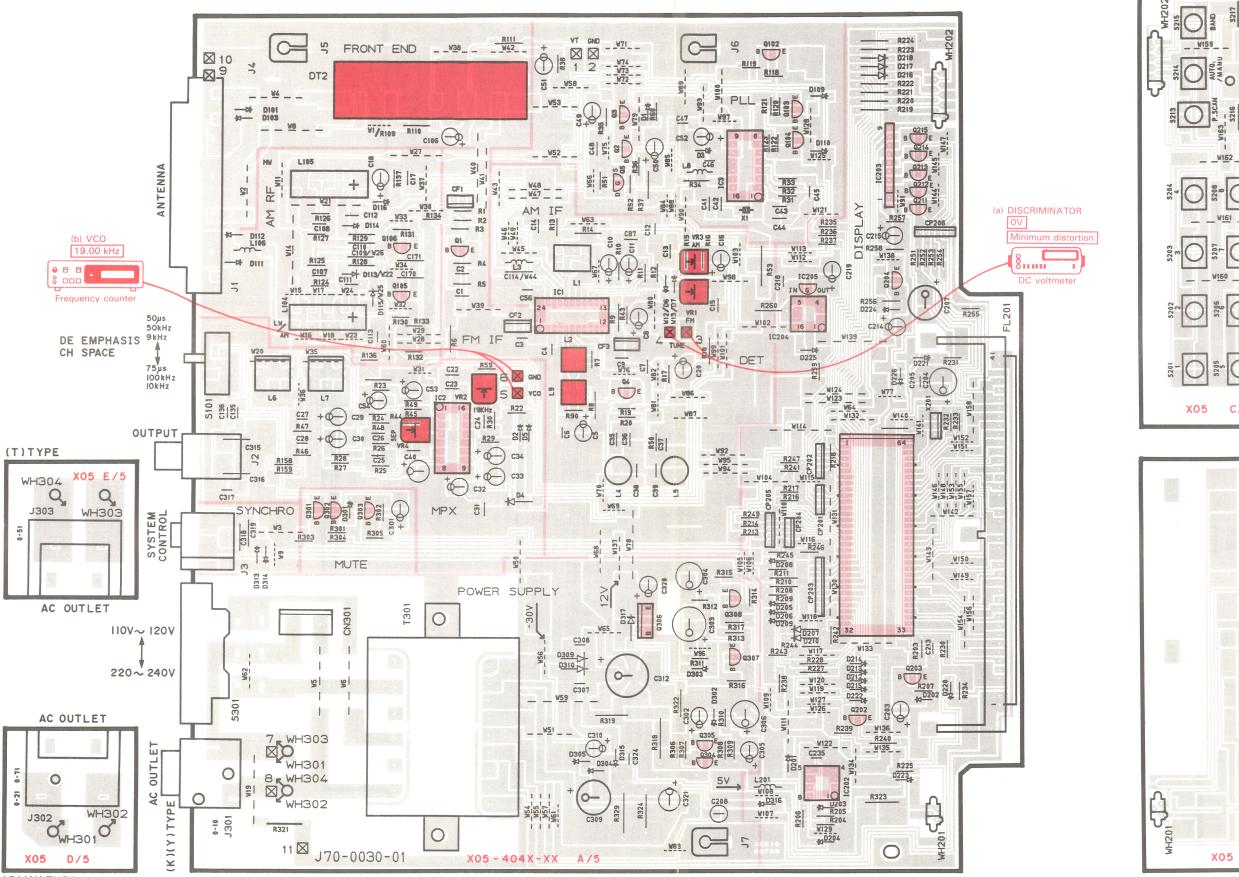
PC BOARD (KT-591S: Component side view)

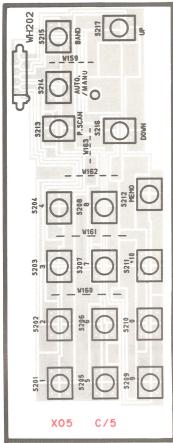




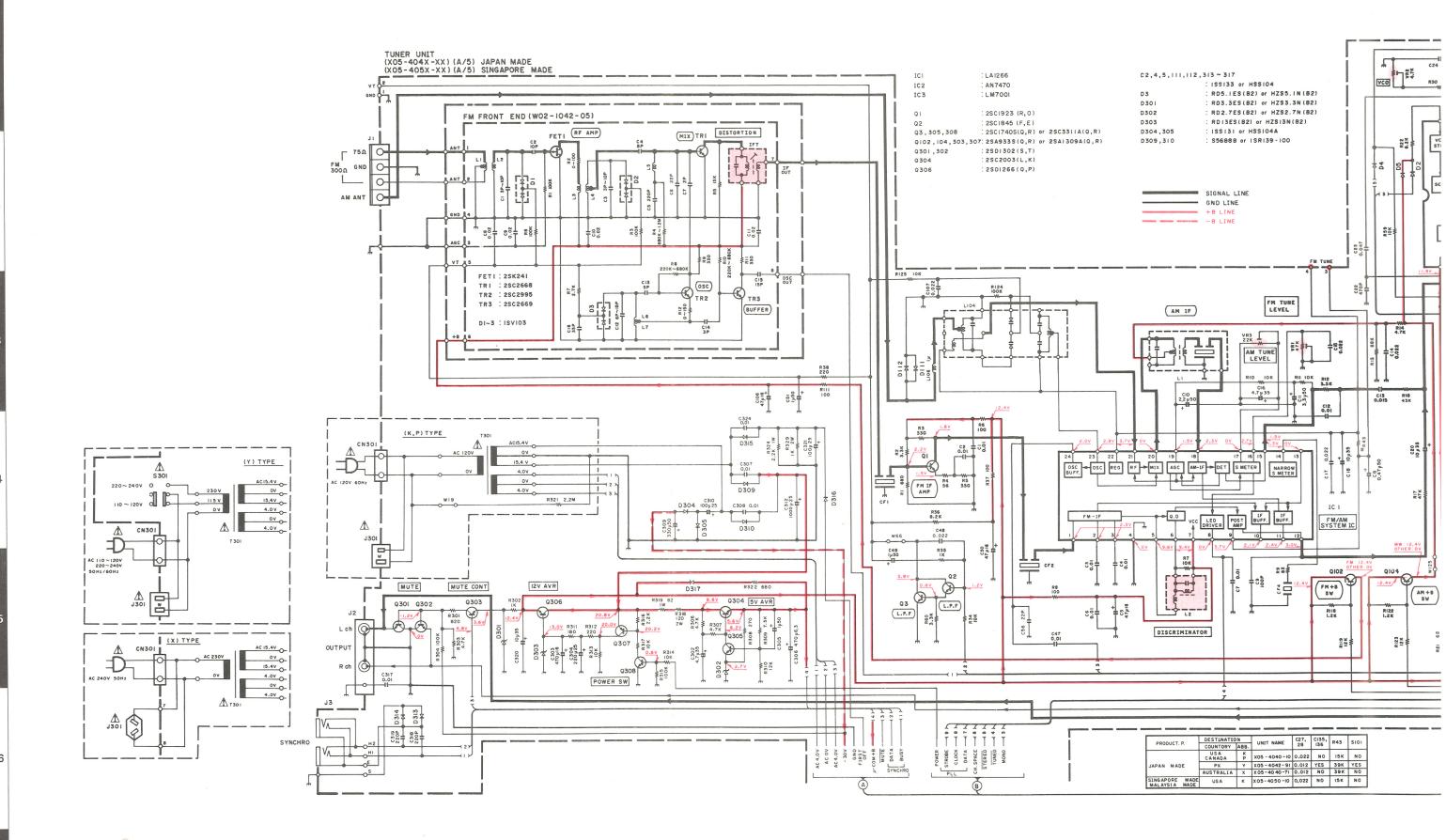


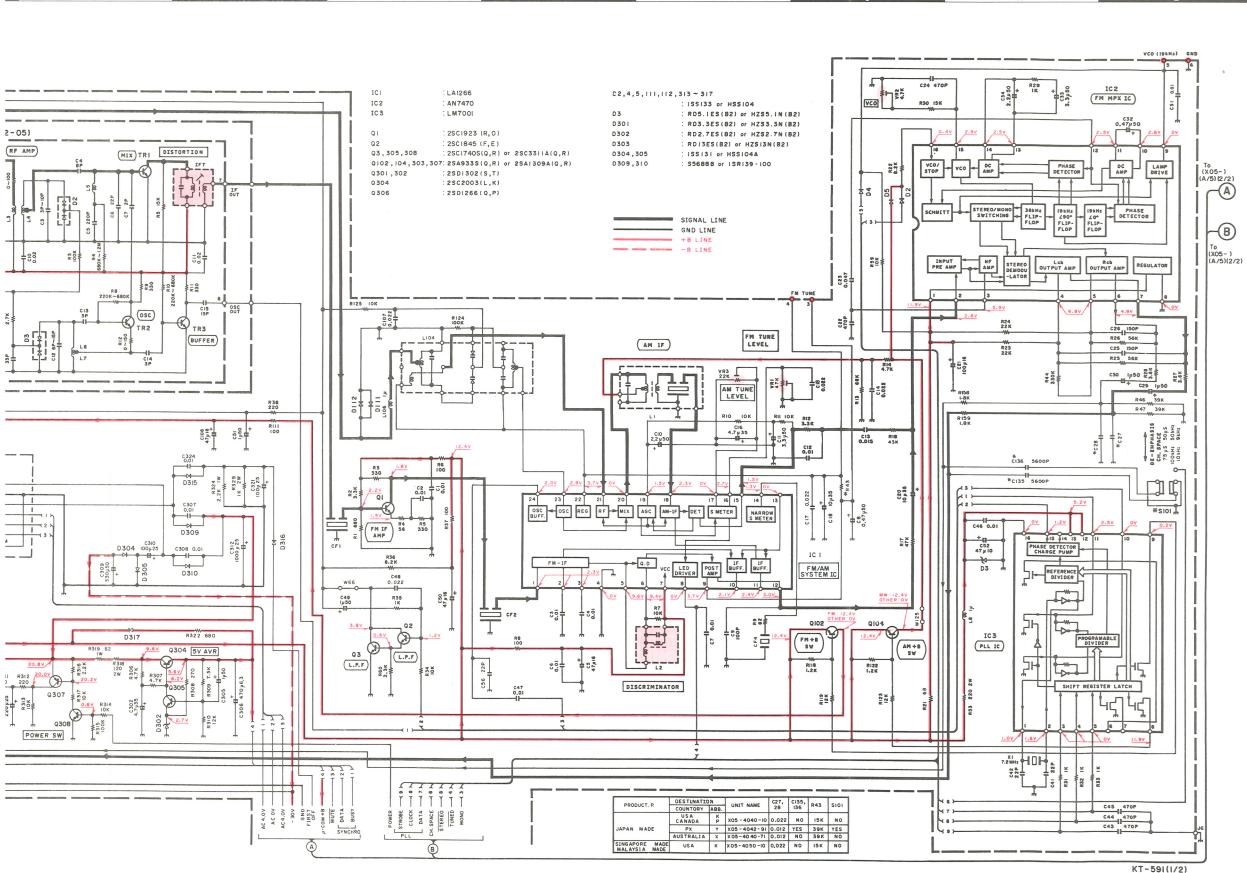
PC BOARD (KT-591/1030L: Component side view)





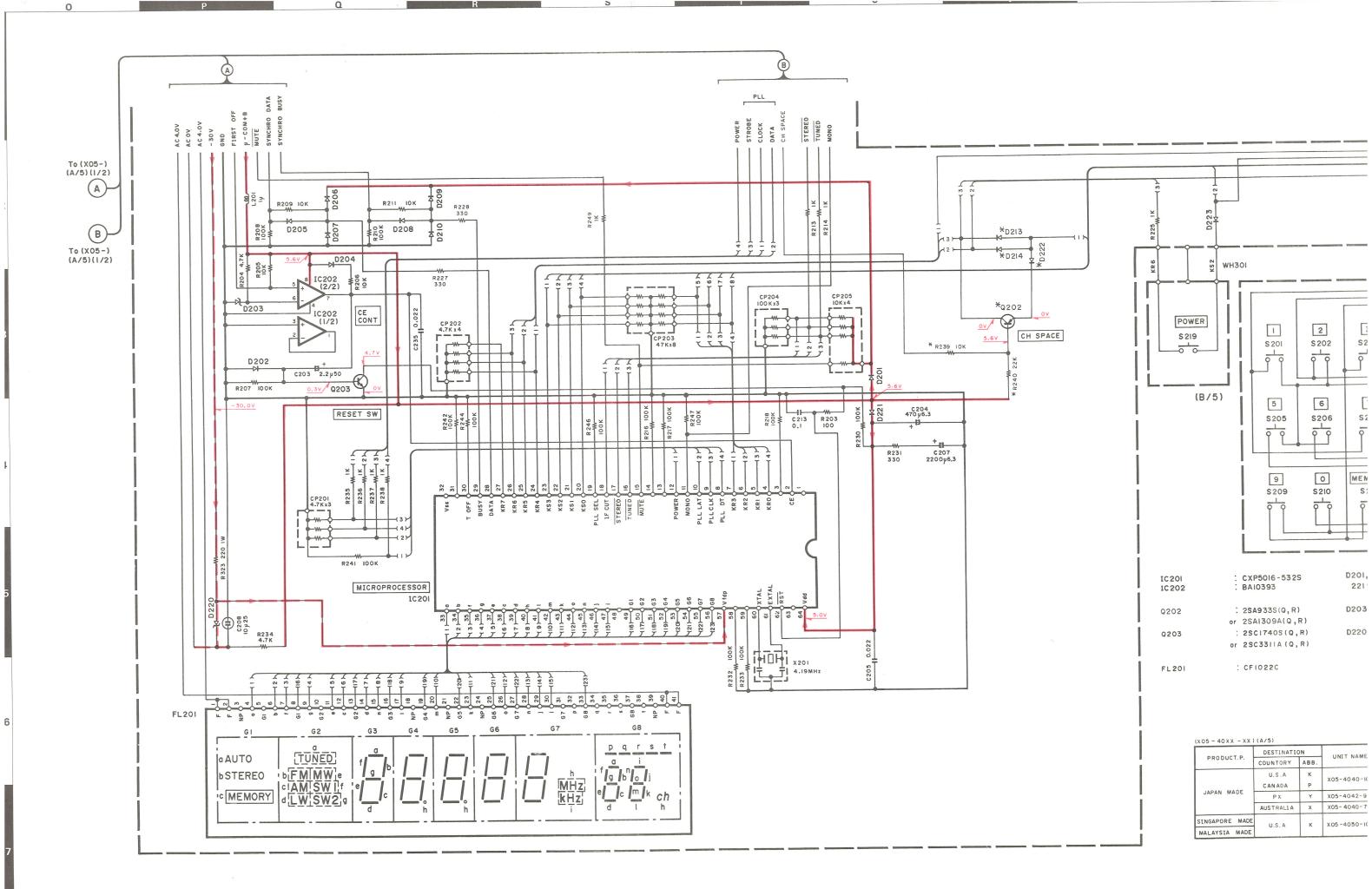


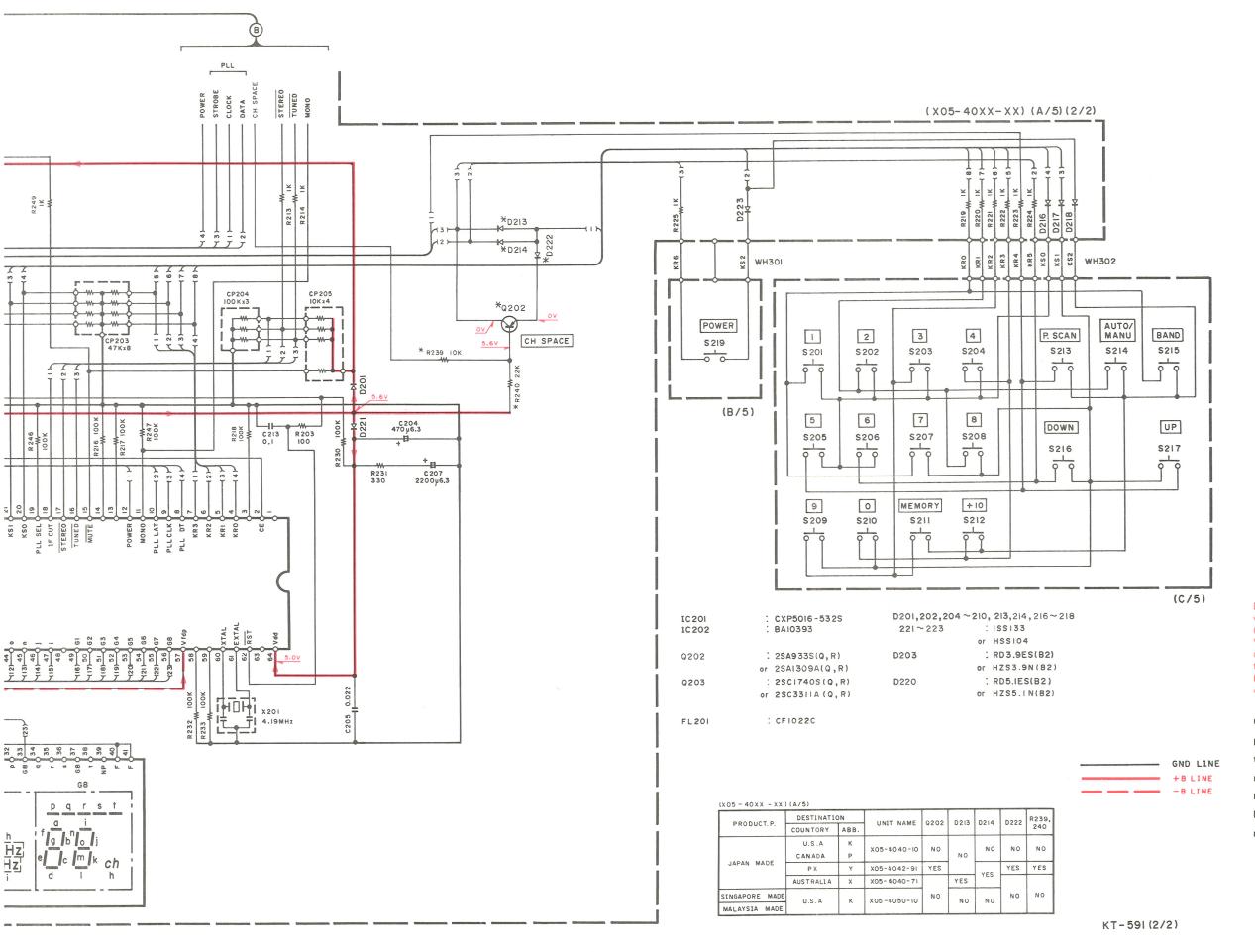


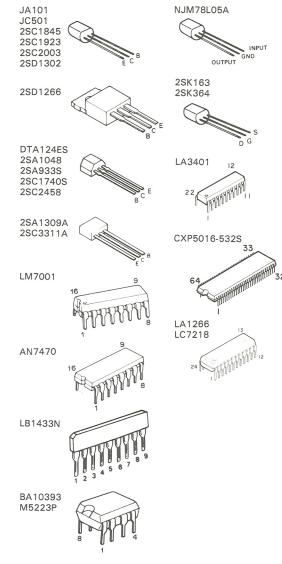


DC voltages are as measured with a high-impedance voltmeter during reception of the FM broadcast signal (with a signal strength of 60 dB at the ANT terminal). Values may vary slightly due to variations between individual instruments or/and units. Values in parentheses are as measured during reception of the AM broadcast signal (with a signal strength of 60 dB at the ANT terminal).

KT-591





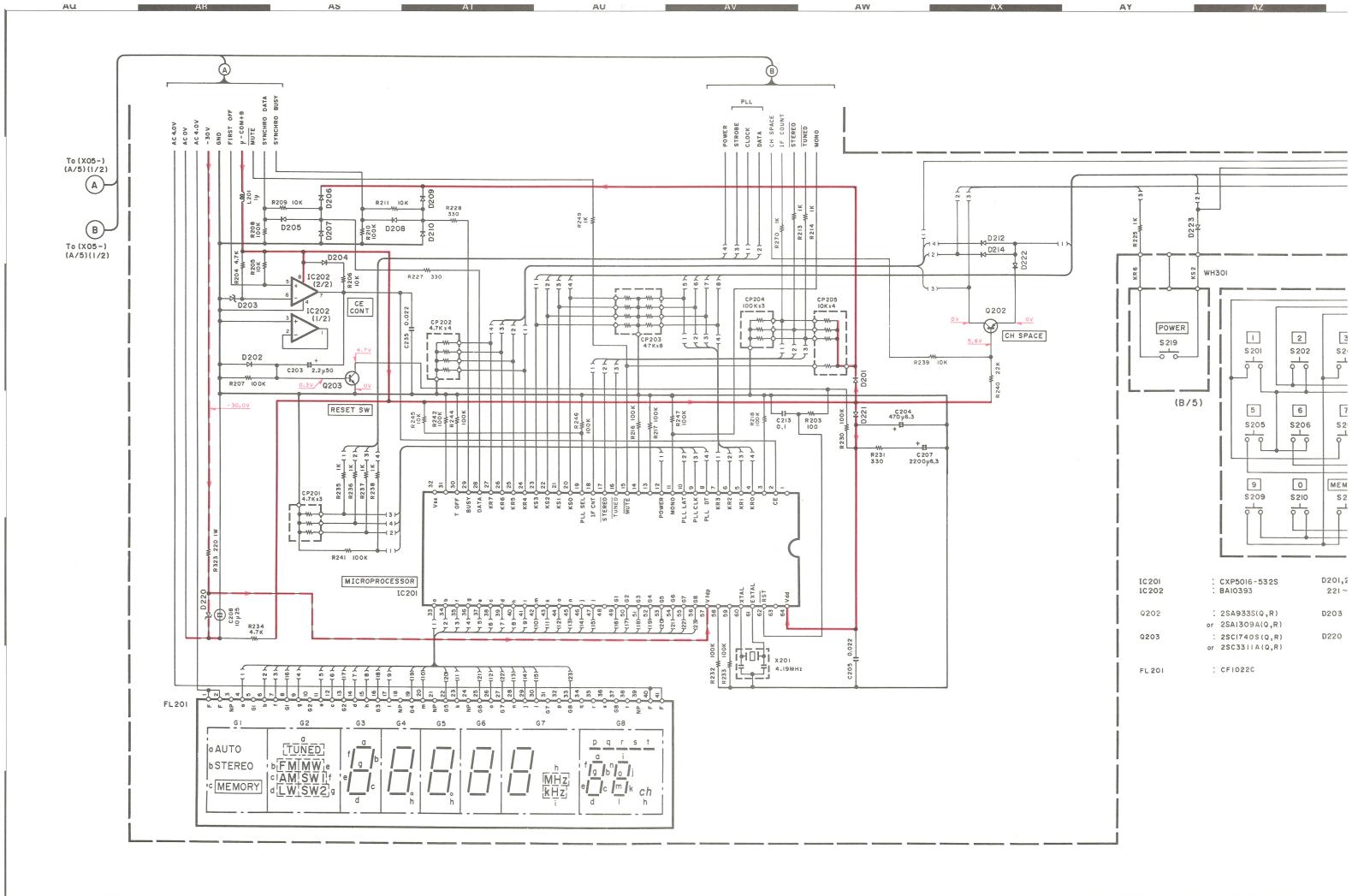


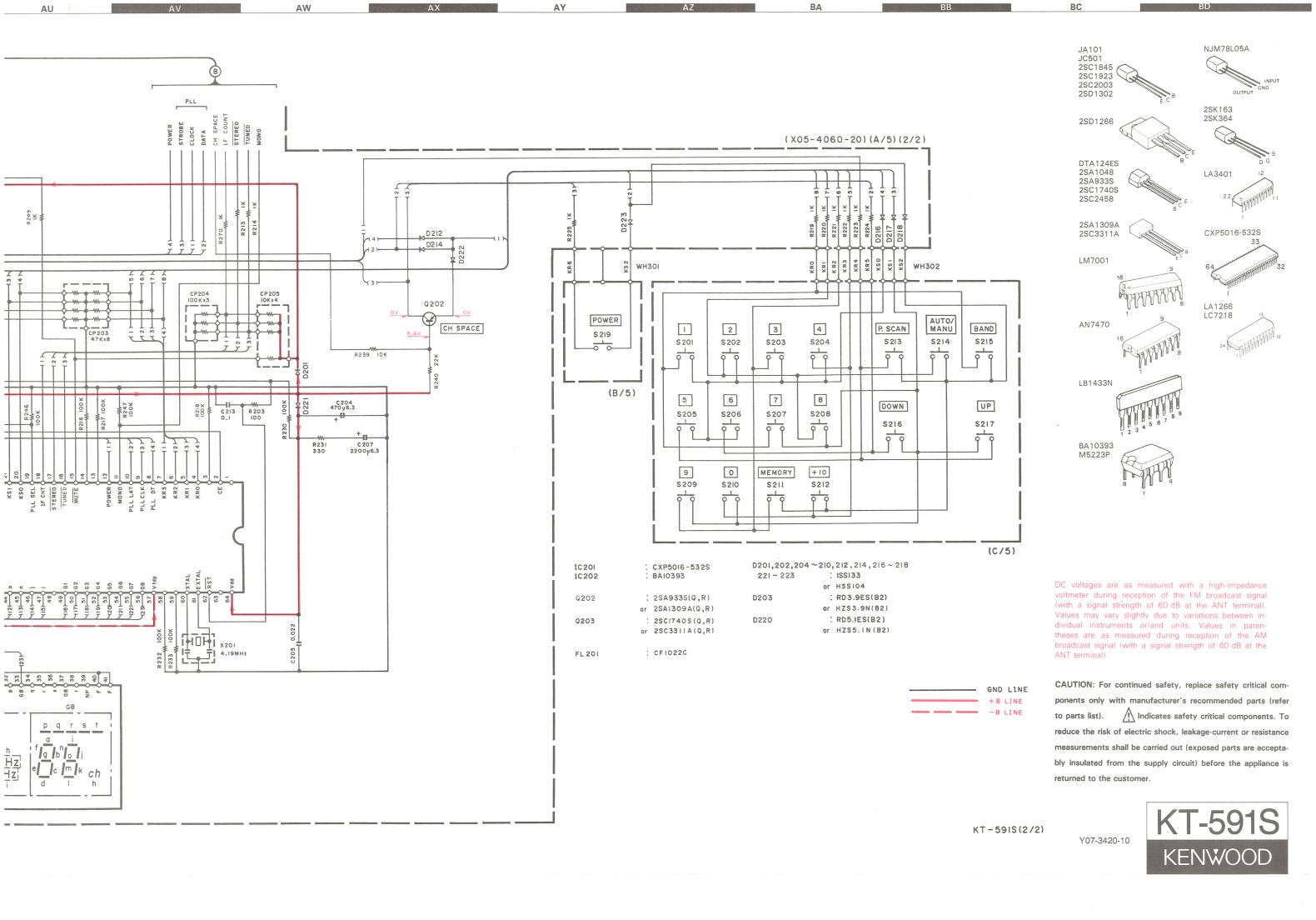
DC voltages are as measured with a high-impedance voltmeter during reception of the FM broadcast signal (with a signal strength of 60 dB at the ANT terminal). Values may vary slightly due to variations between individual instruments or/and units. Values in parentheses are as measured during reception of the AM broadcast signal (with a signal strength of 60 dB at the ANT terminal).

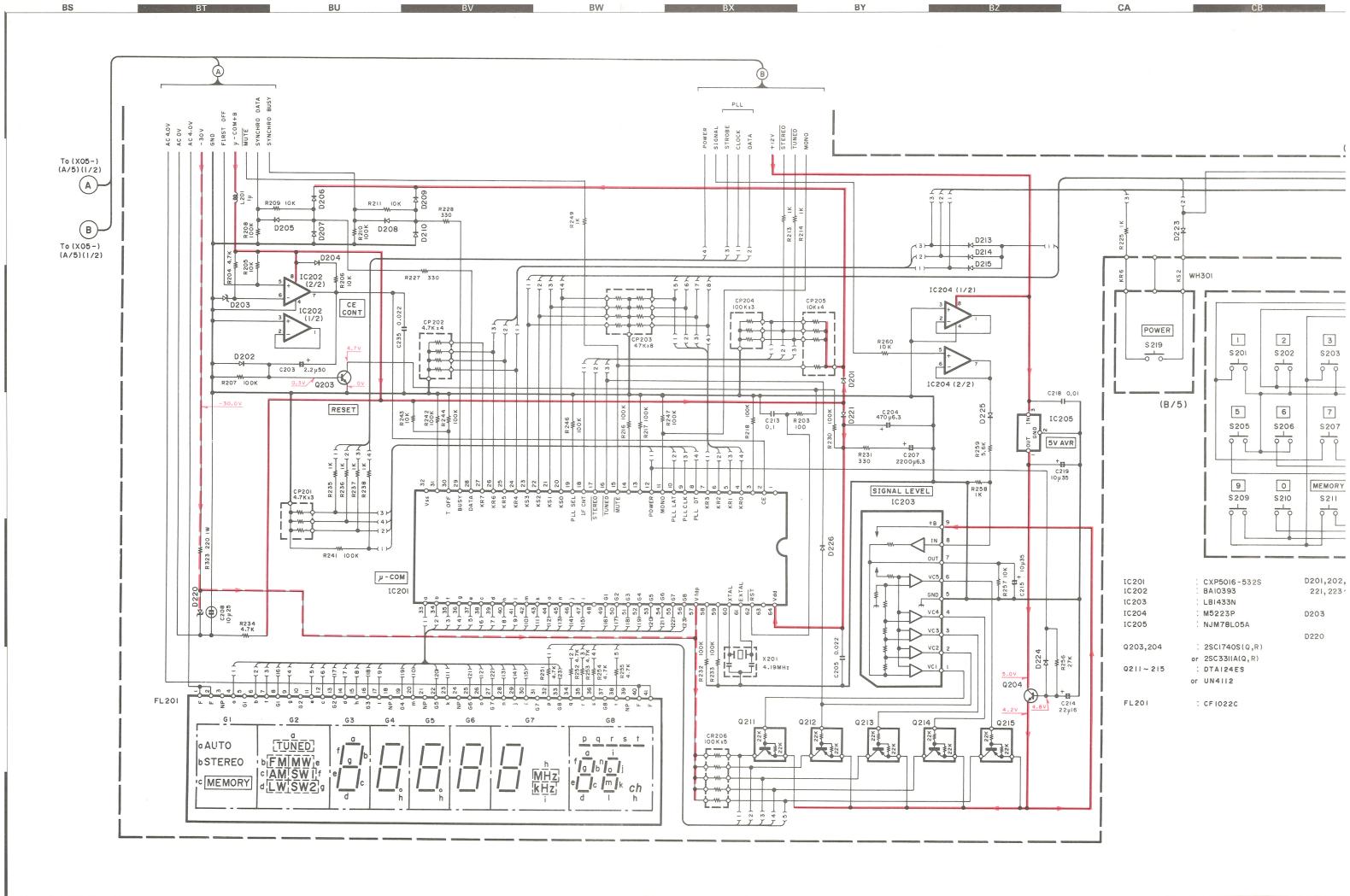
CAUTION: For continued safety, replace safety critical components only with manufacturer's recommended parts (refer to parts list). Indicates safety critical components. To reduce the risk of electric shock, leakage-current or resistance measurements shall be carried out (exposed parts are acceptably insulated from the supply circuit) before the appliance is returned to the customer.

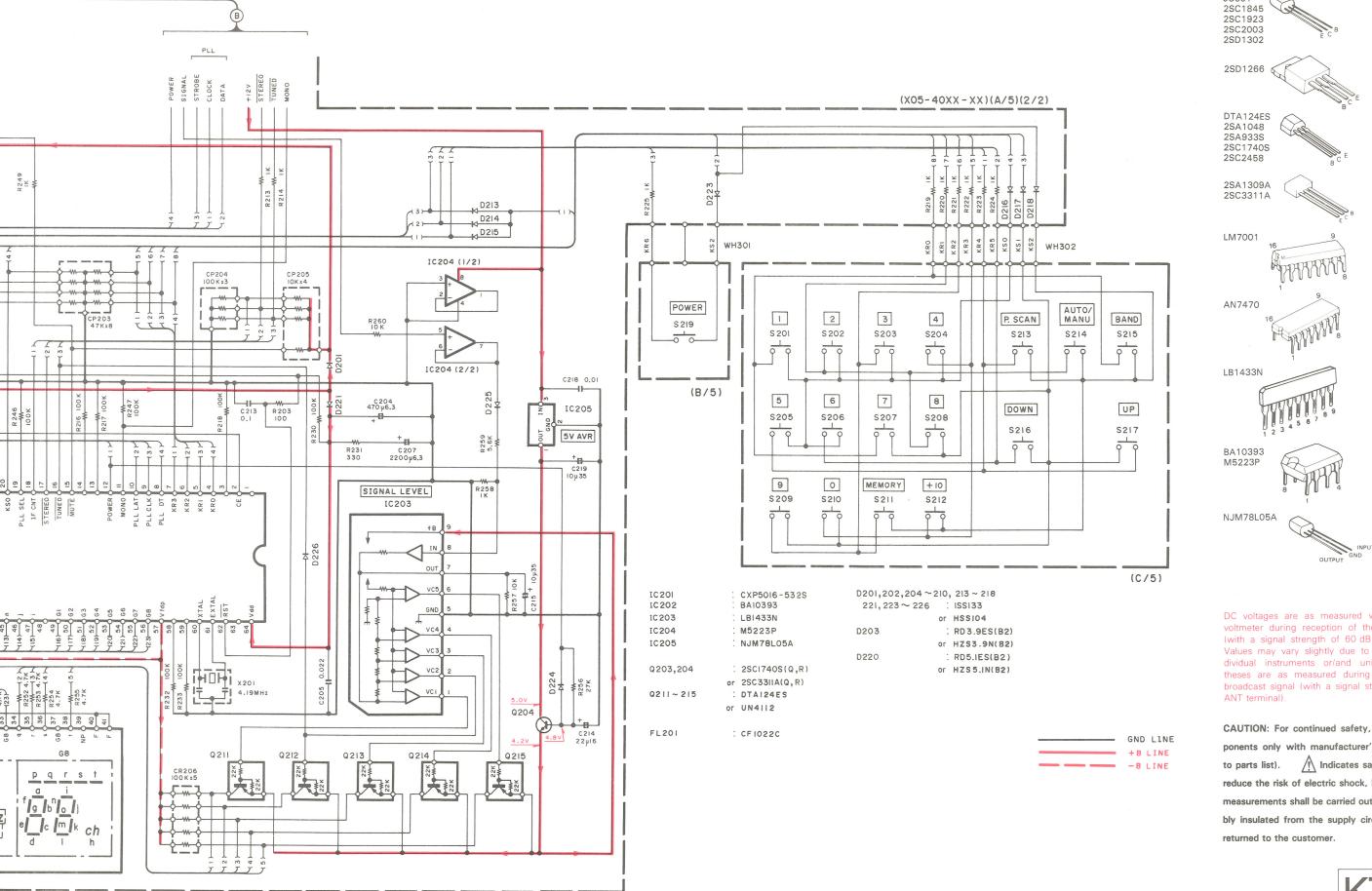
KT-591 KENWOOD

Y07-3420-10





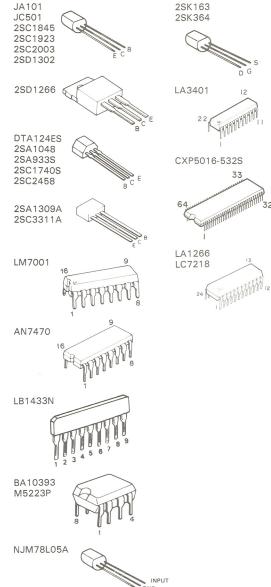




CC

BY

BW



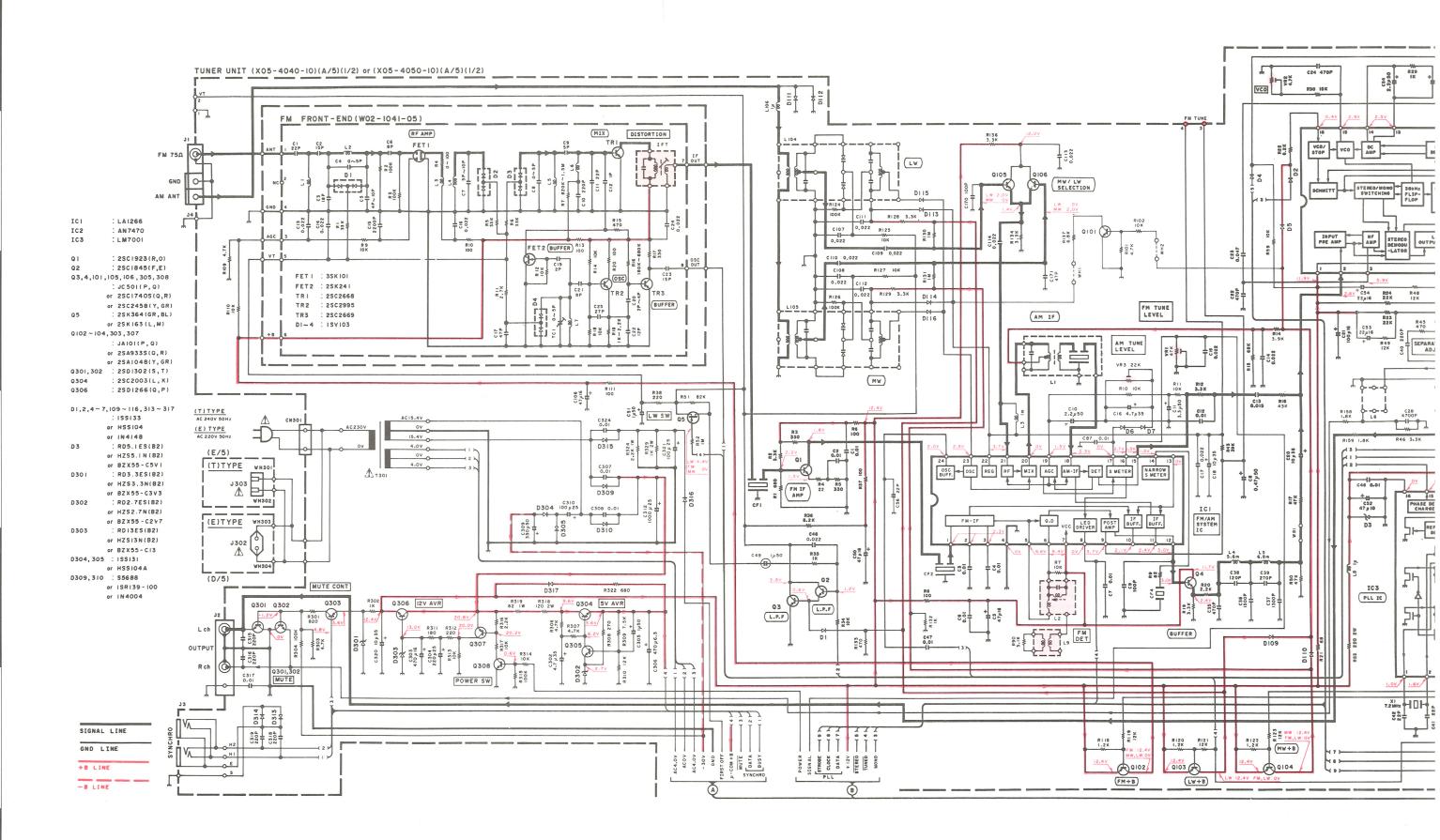
DC voltages are as measured with a high-impedance voltmeter during reception of the FM broadcast signal (with a signal strength of 60 dB at the ANT terminal). Values may vary slightly due to variations between individual instruments or/and units. Values in parentheses are as measured during reception of the AM broadcast signal (with a signal strength of 60 dB at the

CAUTION: For continued safety, replace safety critical components only with manufacturer's recommended parts (refer Indicates safety critical components. To reduce the risk of electric shock, leakage-current or resistance measurements shall be carried out (exposed parts are acceptably insulated from the supply circuit) before the appliance is

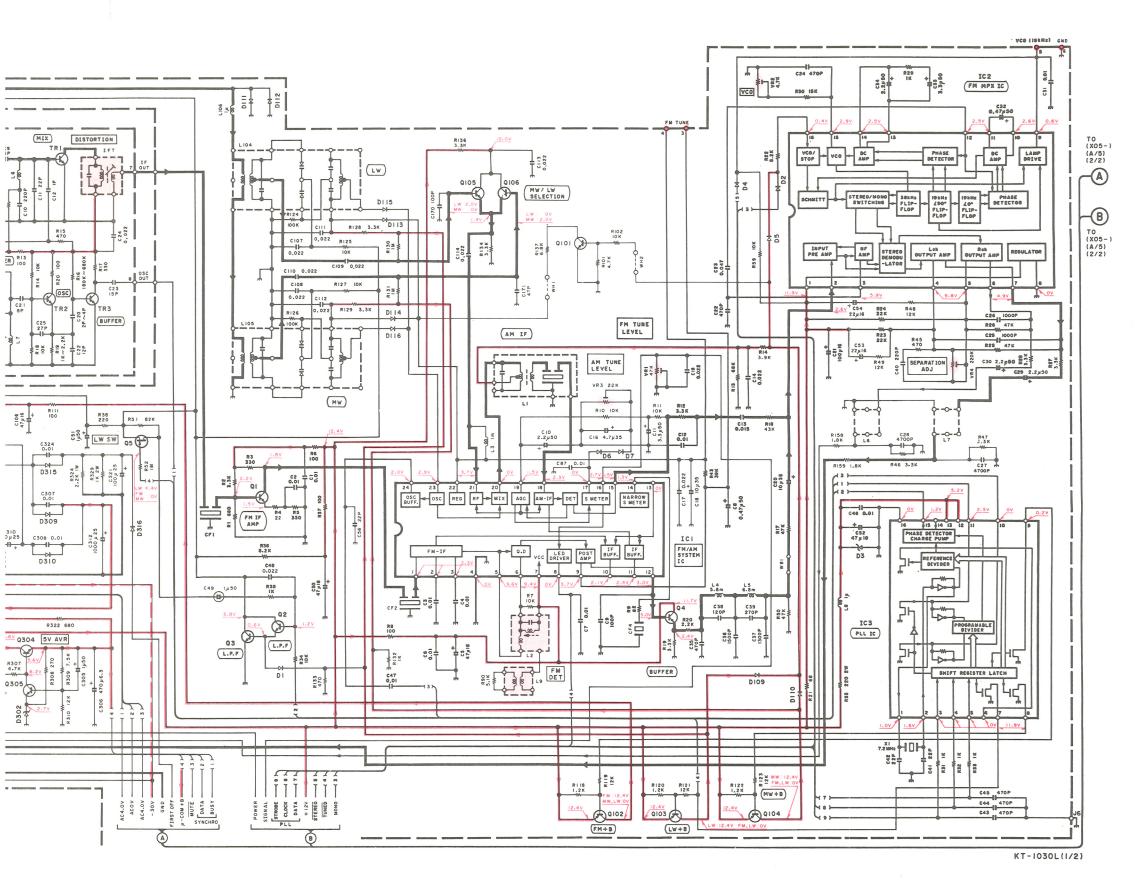
KT-1030L (2/2)

Y07-3420-10





BM

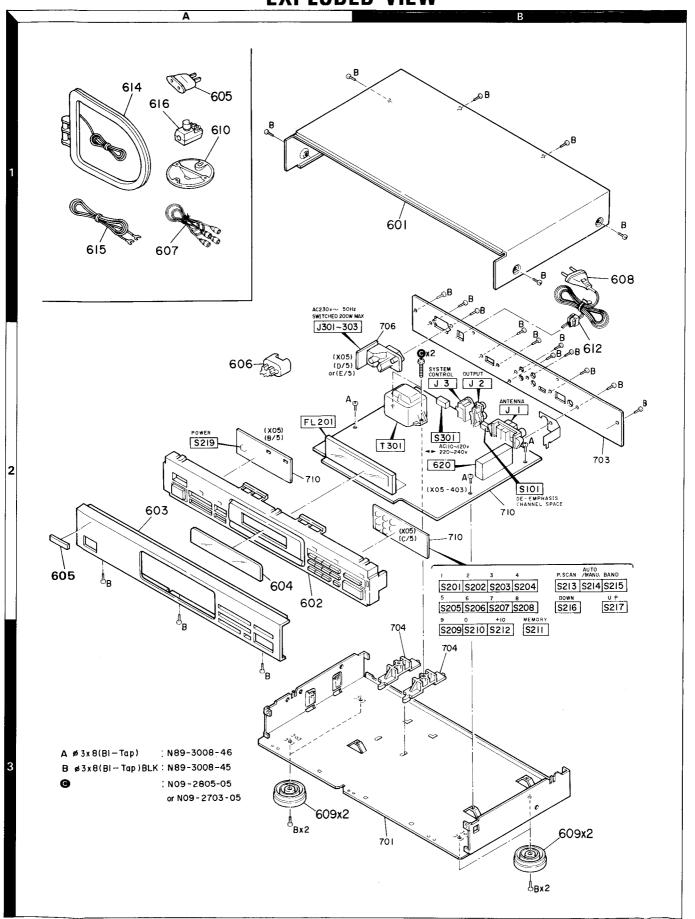


DC voltages are as measured with a high-impedance voltmeter during reception of the FM broadcast signal (with a signal strength of 60 dB at the ANT terminal). Values may vary slightly due to variations between individual instruments or/and units. Values in parentheses are as measured during reception of the AM broadcast signal (with a signal strength of 60 dB at the ANT terminal).

CAUTION: For continued safety, replace safety critical components only with manufacturer's recommended parts (refer to parts list). Indicates safety critical components. To reduce the risk of electric shock, leakage-current or resistance measurements shall be carried out (exposed parts are acceptably insulated from the supply circuit) before the appliance is returned to the customer.



EXPLODED VIEW



Parts with the exploded numbers larger than 700 are not supplied.

PARTS LIST

* New Parts

Parts without ${\bf Parts\ No.}$ are not supplied.

Les articles non mentionnes dans le Parts No. ne sont pas fournis.

Telle ohne Parts No. werden nicht geliefert.

照番号	位 電 1B 2A 2A 2A	* * * * *	部 品 書 号 KT-591 (A01-1939-01 A22-1468-01 A60-0015-02 B03-2689-03 B46-0092-03	部品名/規格 JAPAN MADE) METALLIC CABINET SUB PANEL PANEL DRESSING PLATE		marks 備考
	2A 2A	*	A01-1939-01 A22-1468-01 A60-0015-02 B03-2689-03 B46-0092-03	METALLIC CABINET SUB PANEL PANEL DRESSING PLATE		
	2A 2A	*	A22-1468-01 A60-0015-02 B03-2689-03 B46-0092-03	SUB PANEL PANEL DRESSING PLATE		
	2A	*	B46-0092-03]	
		1	B46-0094-03 B46-0095-03 B46-0096-23	WARRANTY CARD WARRANTY CARD WARRANTY CARD WARRANTY CARD	K Y Y X	
		*	B46-0121-03 B58-0513-04 B60-0324-00 B60-0325-00	WARRANTY CARD CAUTION CARD (PRESET220-240) INSTRUCTION MANUAL(ENGLISH) INSTRUCTION MANUAL(FRENCH)	P Y P	
	2A 1A 1B 1B 1B	*	E03-0114-05 E30-0615-05 E30-2594-15 E30-2605-05 E30-2643-05	AC OUTLET AUDIO CORD AC POWER CORD AC POWER CORD AC POWER CORD AC POWER CORD	X X Y KP	
		*	H10-3780-02 H25-0223-04 H25-0232-04 H50-0013-04	POLYSTYRENE FOAMED FIXTURE PROTECTION BAG (750X350X0.03) PROTECTION BAG (235X350X0.03) ITEM CARTON CASE		
	3A,3B 1A 2B		J02-0366-15 J19-2815-04 J42-0083-05	FOOT ANTENNA HOLDER POWER CORD BUSHING		1
		*	N89-3008-46 N89-3008-45 N09-2703-05	BINDING HEAD TAPTITE SCREW BINDING HEAD TAPTITE SCREW TAPTITE SCREW		
	1 A 1 A		T90-0173-05 T90-0182-15	LOOP ANTENNA LEAD WIRE ANTENNA		
		K	T-591 (SINGAPO		1	
	1B 2A 2A	* *	A01-1940-01 A22-1489-01 A60-0015-02	METALLIC CABINET SUB PANEL PANEL		
	2 A	*	B03-2721-03 B46-0092-03 B60-0324-00	DRESSING PLATE WARRANTY CARD INSTRUCTION MANUAL(ENGLISH)		
	1 A 1 B	*	E30-0615-05 E30-2643-05	AUDIO CORD AC POWER CORD		
		*	H10-3819-02 H10-5131-02 H25-0223-04 H25-0232-04 H50-0014-04	POLYSTYRENE FOAMED FIXTURE POLYSTYRENE FOAMED FIXTURE PROTECTION BAG (750X350X0.03) PROTECTION BAG (235X350X0.03) ITEM CARTON CASE	K K	S W
		*	H50-0090-04	ITEM CARTON CASE	к	W
	1		J02-0366-15	FOOT		
	3A,3B 1A 2B		J19-2815-04 J42-0083-05	ANTENNA HOLDER POWER CORD BUSHING		
		1B 2A 2A 2A 1A 1B	1B	Table Tabl	Table Tabl	Total

E: Scandinavia & Europe K: USA

P: Canada

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M: Other Areas

Y: AAFES(Europe)

X: Australia

S: SINGAPORE MADE
W: MALAYSIA MADE

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1	Ref. No.	Address	New Parts	Parts No.	Description		Re- marks
	参照番号	位 置	新	部品番号	部品名/規格	仕 向	備考
	С			N09-2805-05	TAPTITE SCREW		
	614 615	1 A 1 A		T90-0174-05 T90-0182-15	LOOP ANTENNA LEAD WIRE ANTENNA		
				K	T-591S		
	601 602 603	1B 2A 2A	* *	A01-1939-01 A22-1468-01 A60-0016-02	METALLIC CABINET SUB PANEL PANEL		
	604	2A	* *	B03-2689-03 B60-0324-00 B60-0326-00	DRESSING PLATE INSTRUCTION MANUAL(ENGLISH) INSTRUCTION MANUAL(S,A,C)		
Δ	605 607 608	1 A 1 A 1 B		E03-0115-05 E30-0615-05 E30-2592-15	AC PLUG ADAPTER AUDIO CORD AC POWER CORD		
	- - -		*	H10-3780-02 H25-0223-04 H25-0232-04 H50-0089-04	POLYSTYRENE FOAMED FIXTURE PROTECTION BAG (750X350X0.03) PROTECTION BAG (235X350X0.03) ITEM CARTON CASE		
Δ	609 610 612	3A,3B 1A 2B		J02-0366-15 J19-2815-04 J42-0083-05	FOOT ANTENNA HOLDER POWER CORD BUSHING		
	A B C		*	N89-3008-46 N89-3008-45 N09-2703-05	BINDING HEAD TAPTITE SCREW BINDING HEAD TAPTITE SCREW TAPTITE SCREW		
	614 615	1 A 1 A		T90-0173-05 T90-0182-15	LOOP ANTENNA LEAD WIRE ANTENNA		
		•		KT-1030L (FRANCE MADE)		
	601 602 603	1B 2A 2A	* *	A01-1931-01 A22-1495-01 A60-0017-02	METALLIC CABINET SUB PANEL PANEL		
Δ	604 - - 605 607 608	2A 2A 1A 1B	* * *	B03-2718-03 B46-0139-03 B60-0327-00 B60-0328-00 B43-0287-04 E30-0505-05 E30-2592-15	DRESSING PLATE WARRANTY CARD INSTRUCTION MANUAL(ENGLISH) INSTRUCTION MANUAL(F,G,D,I) KENWOOD BADGE AUDIO CORD AC POWER CORD		
	- - -		*	H10-3781-02 H25-0223-04 H25-0232-04 H50-0070-04	POLYSTYRENE FOAMED FIXTURE PROTECTION BAG (750X350X0.03) PROTECTION BAG (235X350X0.03) ITEM CARTON CASE		
Δ	609 610 612	3A,3B 1A 2B		J02-1024-05 J19-2815-04 J42-0083-05	FOOT ANTENNA HOLDER POWER CORD BUSHING		
	A B C		*	N89-3008-46 N89-3008-45 N09-2703-05	BINDING HEAD TAPTITE SCREW BINDING HEAD TAPTITE SCREW TAPTITE SCREW		
	614 615 616	1 A 1 A 1 A		T90-0153-05 T90-0176-05 T90-0177-05	LOOP ANTENNA T TYPE ANTENNA ANTENNA ADAPTOR		

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ı	Ref.	No		Add	lress	New Parts		Parts	No.	С	Description		Desti- nation	Re-
	参照	番	号	位	置	≸ ī	部		番号		1 名/規	格		備考
				1		ı	K	T-1	030L (S	INGAPORE N	(ADE)			
	601 602 603			1B 2A 2A		* *	A01-1 A22-1 A60-0	488	-01	METALLIC CAE SUB PANEL PANEL	BINET			
♠	604 - - - 605 607 608 608			2A 1A 1B 1B		*	B03-2 B46-0 B46-0 B60-0 B43-0 E30-2 E30-2	122 143 1327 1328 1287 1505 2592	-13 -13 -00 -00 -04 -05 -15	DRESSING PLA WARRANTY CAR WARRANTY CAR INSTRUCTION INSTRUCTION KENWOOD BAD AUDIO CORD AC POWER COR AC POWER COR	RD RD MANUAL(EN MANUAL(F, PGE	NGLISH) G,D,I)	E	
	-					*	H10-3 H25-0 H25-0 H50-0	223 232 015	-04 -04 -04	POLYSTYRENE PROTECTION B PROTECTION B ITEM CARTON ITEM CARTON	AG (750X3 AG (235X3 CASE	(50X0.03	T E	
҈Ѧ	609 610 612			3A, 1A 2B	3B		J02-1 J19-2 J42-0	815	-04	FOOT ANTENNA HOLD POWER CORD B			TE	
	A B C						N89-3 N89-3 N09-2	800	-45	BINDING HEAD BINDING HEAD TAPTITE SCRE	TAPTITE			
	614 615 616			1 A 1 A 1 A			T90-0 T90-0 T90-0	175 177	-05 -05	LOOP ANTENNA T TYPE ANTEN ANTENNA ADAP	NA TOR		TE TE	
	C1 -		T-5	591	TUI	NEF				X-XX) (0-10:			: X)	
	C5 C6 C8 C9						CK45F CE04K CK45F CE04K CC45F	W1C F1H W1H	470M 103Z R47M	CERAMIC ELECTRO CERAMIC ELECTRO CERAMIC	0.010UF 47UF 0.010UF 0.47UF 100PF	Z 16WV Z 50WV J		
	C10 C11 C12 C13 C14,	15				ŀ	CE04K CE04K CK45F CQ92F CK45F	W1H F1H M1H	3R3 M 103Z 153J	ELECTRO ELECTRO CERAMIC MYLAR CERAMIC	2.2UF 3.3UF 0.010UF 0.015UF 0.022UF	50WV 50WV Z J Z		
	C16 C17 C18 C20 C21						CE04K CK45F CE04K CE04K CE04K	F1H: W1V W1V	223Z 100M 100M	ELECTRO CERAMIC ELECTRO ELECTRO ELECTRO	4.7UF 0.022UF 10UF 10UF 100UF	35WV Z 35WV 35WV 16WV		
	C22 C23 C24 C25 ,:					*	CK45F CF92F CC93F CC45F CQ92F	V1H CH1I SL1I	473J H471J H151J	CERAMIC MF CERAMIC CERAMIC MYLAR	470PF 0.047UF 470PF 150PF 0.012UF	K J J J	YX	
	C27 ,: C29 ,: C31 C32 C33						CQ92F CE04K CK45F CE04K CE04K	W1H0 F1H1 W1H1	D10M 103Z R47M	MYLAR ELECTRO CERAMIC ELECTRO ELECTRO	0.022UF 1.0UF 0.010UF 0.47UF 3.3UF	J 50WV Z 50WV 50WV	KP	

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参照:	番号	位	置	Parts 新	部	品	番号	部	品	名。	/ 規	格	nation 仕 向	marks 備考
C34 C41 ,4 C43 -4 C46 ,4	45				CE04K CC45F CK45F CK45F CQ92F	CH1 B1H F1H	H220J 471K 103Z	ELECTRO CERAMIC CERAMIC CERAMIC MYLAR			F	50WV J K Z J		
C49 C50 C51 C52 C56					CEO4K CEO4K CEO4K CEO4K CC45F	W1C W1H W1A	470M 010M 470M	ELECTRO ELECTRO ELECTRO ELECTRO CERAMIC		1.00 47U 1.00 47U 22P	JF F	50WV 16WV 50WV 10WV J		
C106 C107 C135,: C203 C204	136				CE04K CK45F CQ92F CE04K CE04K	F1H M1H W1H	223Z 562J 2R2M	ELECTRO CERAMIC MYLAR ELECTRO ELECTRO		47UE 0.02 5600 2.2U 470U	22UF OPF JF	16WV Z J 50WV 6.3WV	Y	
C205 C207 C208 C213 C235					CK45F CE04K C90-1 CF92F CK45F	WOJ 332 V1H	222M -05 104J	CERAMIC ELECTRO NP-ELEC MF CERAMIC		2200 10UF 0.10	7	Z 6.3WV 25WV J Z		
C302 C303 C304 C305 C306					CE04K CE04D CE04K CE04K CE04K	W1C W1E W1H	471M 221M 010M	ELECTRO ELECTRO ELECTRO ELECTRO ELECTRO		4.70 470 220 1.0 470	JF JF JF	35WV 16WV 25WV 50WV 6.3WV		
C307,3 C309 C310 C312 C317	308				CK45F CE04K CE04K CE04K CK45F	W1H: W1E W1E	331M 101M 102M	CERAMIC ELECTRO ELECTRO ELECTRO CERAMIC		330L 100L 100C	JF .	Z 50WV 25WV 25WV Z		
C318,3 C320 C321 C324	319				C91-0 CE04K CE04K CK45F	W1V W1E	100M 101M	CERAMIC ELECTRO ELECTRO CERAMIC		220F 10UF 100U 0.01	; JF	K 35WV 25WV Z		
J1 J2 J3 J301		2B 2B 2B 2A		*	E20-0 E13-0 E11-0 E03-0	235 188	-05 -05	LOCK TERMI PHONO JACK MINIATURE AC OUTLET			(OUTPUT)	кру	
CF1 ,2 CF4 L1 L2 L8	2				L72-0 L72-0 L30-0 L30-0 L40-1	096 488 439	-05 -05 -25	CERAMIC FI CERAMIC FI AM IFT FM IFT SMALL FIXE	LTE	R	CT0R(1uH)		
L104 L106 L201 T301		2B 2B		*	L39-0 L40-1 L40-1 L07-0 L07-0	091 091 247	-17 -17 -05	COMBINATION SMALL FIXE SMALL FIXE POWER TRANS POWER TRANS	D I D I SFO	NDUC NDUC RMER	TOR (KP Y	
T301 X1 X201 X201		2B		*	L07-0 L77-1 L78-0 L78-0	122 209	-05 -05	POWER TRANS CRYSTAL RES RESONATOR RESONATOR		ATOF 4)	?(7.2 .194	MHz) MHz) MHz)	х	
CP201 CP202					R90-0 R90-0			MULTI-COMP MULTI-COMP		4.7K 47KX		J 1/6W J 1/6W		

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CP203 CP204 CP205 R53 R318			R90-0804-05 R90-0850-05 R90-0809-05 RS14DB3D221J RS14DB3D121J	MULTI-COMP 47KX8 J 1/4W MULTIPLE RESISTOR 100KX3 MULTIPLE RESISTOR 10KX4 FL-PROOF RS 220 J 2W FL-PROOF RS 120 J 2W		
R319 R321 R323 R324 R329			RS14DB3A820J R92-0173-05 RS14DB3A221J RS14DB3A222J RS14DB3D102J	FL-PROOF RS 82 J 1W RC 2.2M M 1/2W FL-PROOF RS 220 J 1W FL-PROOF RS 2.2K J 1W FL-PROOF RS 1.0K J 2W	KP	
VR1 VR2 VR3		*	R12-3688-05 R12-1619-05 R12-3686-05	TRIMMING POT(47K)FM TUNE LEVEL TRIMMING POT(4.7K)VCO TRIMMING POT(22K)AM TUNE LEVEL		
S101 S201-217 S219 S301	2B 2B 2A 2B		S31-2094-05 S40-1064-05 S40-1064-05 S31-2131-05	SLIDE SWITCH(DE-EM.,CH SPACE) PUSH SWITCH PUSH SWITCH (POWER) SLIDE SWITCH(POWER TYPE)	Y Y	
D2 D2 D3 D3 D4 ,5			HSS104 1SS133 HZS5.1N(B2) RD5.1ES(B2) HSS104	DIODE DIODE ZENER DIODE ZENER DIODE DIODE		
D4 ,5 D111,112 D111,112 D201,202 D201,202			1SS133 HSS104 1SS133 HSS104 1SS133	DIODE DIODE DIODE DIODE		
D203 D203 D204-210 D204-210 D213			HZS3.9N(B2) RD3.9ES(B2) HSS104 1SS133 HSS104	ZENER DIODE ZENER DIODE DIODE DIODE DIODE	x	
D213 D214 D214 D216-218 D216-218			1SS133 HSS104 1SS133 HSS104 1SS133	DIODE DIODE DIODE DIODE DIODE	X YX YX	
D220 D220 D221 D221 D222			HZS5.1N(B2) RD5.1ES(B2) HSS104 1SS133 HSS104	ZENER DIODE ZENER DIODE DIODE DIODE DIODE DIODE	Y	
D222 D223 D223 D301 D301			1SS133 HSS104 1SS133 HZS3.3N(B2) RD3.3ES(B2)	DIODE DIODE DIODE ZENER DIODE ZENER DIODE	Y	
D302 D302 D303 D303 D304,305			HZS2.7N(B2) RD2.7ES(B2) HZS13N(B2) RD13ES(B2) HSS104A	ZENER DIODE ZENER DIODE ZENER DIODE ZENER DIODE DIODE		
D304,305 D309,310			1SS131 S5688B	DIODE		

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D309,310 D313-317 D313-317 FL201 IC1	2A	*	1SR139-100 HSS104 1SS133 CF1022C LA1266	DIQDE DIQDE DIQDE FLUQRESCENT INDICATOR TUBE IC(AM/FM IF)		
IC2 IC3 IC201 IC202 Q1		*	AN7470 LM7001 CXP5016-532S BA10393 2SC1923(R,0)	IC(FM MPX) IC(PLL FREQUENCY SYNTHESIZER) IC(4BIT MICROCONPUTER) IC(DUAL COMPALATOR) TRANSISTOR	:	
Q2 Q3 Q3 Q102 Q102		*	2SC1845(F,E) 2SC1740S(Q,R) 2SC3311A(Q,R) 2SA1309A(Q,R) 2SA933S(Q,R)	TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR		
Q104 Q104 Q202 Q202 Q203		*	2SA1309A(Q,R) 2SA933S(Q,R) 2SA1309A(Q,R) 2SA933S(Q,R) 2SC1740S(Q,R)	TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR	Y Y	
Q203 Q301,302 Q303 Q303 Q304		*	2SC3311A(Q,R) 2SD1302(S,T) 2SA1309A(Q,R) 2SA933S(Q,R) 2SC2003(L,K)	TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR		
Q305 Q305 Q306 Q307 Q307		*	2SC1740S(Q,R) 2SC3311A(Q,R) 2SD1266(Q,P) 2SA1309A(Q,R) 2SA933S(Q,R)	TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR		
Q308 Q308			2SC1740S(Q,R) 2SC3311A(Q,R)	TRANSISTOR TRANSISTOR		
620	2B		W02-1042-05	FM FRONT-END ASSY		
			KT-591S TUNER	UNIT (X05-4060-20)		
C1 -4 C5 C6 ,7 C8 C9			CK45FF1H103Z CE04KW1C470M CK45FF1H103Z CE04KW1HR47M CC45FSL1H101J	CERAMIC		
C10 C11 C12 C13 C14 ,15			CE04KW1H2R2M CE04KW1H3R3M CK45FF1H223Z CQ92FM1H223J CK45FF1H223Z	ELECTRO	i	
C16 C17 C18 C20 C21			CE04KW1V4R7M CK45FF1H223Z CE04KW1C101M CE04KW1V100M CE04KW1C101M	ELECTRO		
C27 ,28 C29 ,30 C41 C42 C43 -45		*	CQ92FM1H133J CE04KW1H2R2M CC45FCH1H22OJ CC45FCH1H27OJ CK45FB1H471K	MYLAR 0.013UF J ELECTRO 2.2UF 50WV CERAMIC 22PF J CERAMIC 27PF J CERAMIC 470PF K		

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C46 C47 C49 C50 C51			CK45FF1H103Z C91-0769-05 CE04KW1H010M CE04KW1C470M CE04KW1H010M	CERAMIC CERAMIC ELECTRO ELECTRO ELECTRO	0.010UF 0.01UF 1.0UF 47UF 1.0UF	Z K 50WV 16WV 50WV		
C52 C56 C62 -64 C65 C66			CE04KW1A470M CC45FSL1H220J CE04KW1H010M CE04KW1HR22M CE04KW1V100M	ELECTRO CERAMIC ELECTRO ELECTRO ELECTRO	47UF 22PF 1.0UF 0.22UF 10UF	10WV J 50WV 50WV 35WV		
C67,68 C69 C70 C71 C81			CC45FSL1H101J CE04KW1V100M CK45FB1H561K CQ92FM1H103J CQ92FM1H223J	CERAMIC ELECTRO CERAMIC MYLAR MYLAR	100PF 10UF 560PF 0.010UF 0.022UF	J 35WV K J J		
C82 C83 C85 C86 C106			CE04KW1H010M CK45FB1H471K CC45FSL1H101J CK45FF1H223Z CE04KW1C470M	ELECTRO CERAMIC CERAMIC CERAMIC ELECTRO	1.0UF 470PF 100PF 0.022UF 47UF	50WV K J Z 16WV		
C108 C110 C112,113 C114 C135,136			CK45FF1H223Z C91-0085-05 CK45FF1H223Z C91-0085-05 CQ92FM1H682J	CERAMIC CERAMIC CERAMIC CERAMIC MYLAR	0.022UF 0.022UF 0.022UF 0.022UF 6800PF	Z N Z N J		
C152,153 C154,155 C156-159 C160,161 C162,163			CK45FF1H223Z CE04KW1H010M CK45FF1H223Z C91-0085-05 CK45FF1H223Z	CERAMIC ELECTRO CERAMIC CERAMIC CERAMIC	0.022UF 1.0UF 0.022UF 0.022UF 0.022UF	Z 50WV Z N Z		
C164 C166 C167 C168 C169		*	CC93FCH1H272J CC45FCH1H120J C91-1431-05 CK45FF1H223Z CE04KW1H010M	CERAMIC CERAMIC CERAMIC CERAMIC ELECTRO	2700PF 12PF 0.0068UF 0.022UF 1.0UF	J J J Z 50WV		
0171 0203 0204 0205 0207			C91-0745-05 CE04KW1H2R2M CE04KW0J471M CK45FF1H223Z CE04KW0J222M	CERAMIC ELECTRO ELECTRO CERAMIC ELECTRO	100PF 2.2UF 470UF 0.022UF 2200UF	K 50WV 6.3WV Z 6.3WV		
0208 0213 0235 0302 0303			C90-1332-05 CF92FV1H104J CK45FF1H223Z CE04KW1V4R7M CE04DW1C471M	NP-ELEC MF CERAMIC ELECTRO ELECTRO	10UF 0.10UF 0.022UF 4.7UF 470UF	25WV J Z 35WV 16WV		
0304 0305 0306 0307,308			CE04KW1E221M CE04KW1H010M CE04KW0J471M CK45FF1H103Z CE04KW1H331M	ELECTRO ELECTRO CERAMIC ELECTRO	220UF 1.0UF 470UF 0.010UF 330UF	25WV 50WV 6.3WV Z 50WV		
0310 0312 0317 0318,319 0320			CE04KW1E101M CE04KW1E102M CK45FF1H103Z CC45FSL1H221J CE04KW1V100M	ELECTRO ELECTRO CERAMIC CERAMIC ELECTRO	100UF 1000UF 0.010UF 220PF 10UF	25WV 25WV Z J 35WV		

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	C321 C324 TC101			CE04KW1E101M CK45FF1H103Z C05-0216-05	ELECTRO 100UF 25WV CERAMIC 0.010UF Z CERAMIC TRIMMER CAPACITOR(10PF	
Δ	J1 J2 J3 J302	2B 2B 2B 2A		E20-0476-05 E13-0235-05 E11-0188-05 E03-0108-05	LOCK TERMINAL BOARD (ANTENNA) PHONO JACK (OUTPUT) MINIATURE PHONE JACK(S.CONTROL AC OUTLET	
	CF1 ,2 L1 L2 L3 L8			L72-0531-05 L30-0467-05 L30-0439-25 L40-1021-14 L40-1091-17	CERAMIC FILTER AM IFT FM IFT SMALL FIXED INDUCTOR(1.0mH,K) SMALL FIXED INDUCTOR(1.0uH)	
	L105 L106 L107 L108 L109		* *	L39-0192-05 L40-1091-17 L39-0199-05 L31-0608-05 L32-0528-05	COMBINATION COIL SMALL FIXED INDUCTOR(1.0uH) COMBINATION COIL SW-RF COIL SW OSCILLATING COIL	
Δ	L110 L201 T301 X1 X2	2B	*	L40-1021-14 L40-1091-17 L07-0248-05 L77-1122-05 L78-0208-05	SMALL FIXED INDUCTOR(1.0mH,K) SMALL FIXED INDUCTOR(1.0uH) POWER TRANSFORMER CRYSTAL RESONATOR(7.2MHz) RESONATOR (456KHZ)	
	X201 X201			L78-0209-05 L78-0218-05	RESONATOR (4.194MHZ) RESONATOR (4.194MHz)	
	CP201 CP202 CP203 CP204 CP205			R90-0832-05 R90-0487-05 R90-0804-05 R90-0850-05 R90-0809-05	MULTI-COMP 4.7KX3 J 1/6W MULTI-COMP 47KX4 J 1/6W MULTI-COMP 47KX8 J 1/4W MULTIPLE RESISTOR 100KX3 MULTIPLE RESISTOR 10KX4	
	R53 R318 R319 R323 R324			RS14DB3D221J RS14DB3D121J RS14DB3A820J RS14DB3A221J RS14DB3A222J	FL-PROOF RS 220 J 2W FL-PROOF RS 120 J 2W FL-PROOF RS 82 J 1W FL-PROOF RS 220 J 1W FL-PROOF RS 2.2K J 1W	
	R329 VR1 VR3 VR5		*	RS14DB3D102J R12-3688-05 R12-3686-05 R12-6663-05	FL-PROOF RS 1.0K J 2W TRIMMING POT(47K)FM TUNE LEVEL TRIMMING POT(22K)AM TUNE LAVEL TRIMMING POT(330K)SEPARATION	
Δ	S101 S201-217 S219 S301	2B 2B 2A 2B		S31-2094-05 S40-1064-05 S40-1064-05 S31-2131-05	SLIDE SWITCH(DE-EM.,CH SPACE) PUSH SWITCH PUSH SWITCH (POWER) SLIDE SWITCH(POWER TYPE)	
	D3 D3 D11 D11 D109-112			HZS5.1N(B2) RD5.1ES(B2) HSS104 1SS133 HSS104	ZENER DIODE ZENER DIODE DIODE DIODE DIODE	
	D109-112 D114 D114 D116 D116	T. grades		1SS133 HSS104 1SS133 HSS104 1SS133	DIODE DIODE DIODE DIODE	
	D123-130		j	HSS104	DIODE	

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参照番号	位 置	Parts 新	部品番号	部 品 名 / 規 格	nation ma 仕 向 備	arks 情考
D123-130 D131 D132-135 D132-135 D201,202			1SS133 KV1260 HSS104 1SS133 HSS104	DIODE VARIABLE CAPACITANCE DIODE DIODE DIODE DIODE DIODE		
D201,202 D203 D203 D204-210 D204-210			1SS133 HZS3.9N(B2) RD3.9ES(B2) HSS104 1SS133	DIODE ZENER DIODE ZENER DIODE DIODE DIODE		
D212 D212 D214 D214 D216-218			HSS104 1SS133 HSS104 1SS133 HSS104	DIQDE DIQDE DIQDE DIQDE DIQDE		
D216-218 D220 D220 D221-223 D221-223			1SS133 HZS5.1N(B2) RD5.1ES(B2) HSS104 1SS133	DIODE ZENER DIODE ZENER DIODE DIODE DIODE		
D301 D301 D302 D302 D303			HZS3.3N(B2) RD3.3ES(B2) HZS2.7N(B2) RD2.7ES(B2) HZS13N(B2)	ZENER DIODE ZENER DIODE ZENER DIODE ZENER DIODE ZENER DIODE ZENER DIODE		
D303 D304,305 D304,305 D309,310 D309,310			RD13ES(B2) HSS104A 1SS131 S5686B 1SR139-100	ZENER DIODE DIODE DIODE DIODE DIODE		
D313-317 D313-317 FL201 IC1 IC3	2A	*	HSS104 1SS133 CF1022C LA1266 LC7218	DIODE DIODE FLUORESCENT INDICATOR TUBE IC(AM/FM IF) IC(PLL SYNTHESIZER)		
IC4 IC201 IC202 Q1 Q2		*	LA3401 CXP5016-532S BA10393 2SC1923(R,0) 2SC1845(F,E)	IC(FM MPX) IC(4BIT MICROCONPUTER) IC(DUAL COMPALATOR) TRANSISTOR TRANSISTOR		
Q3 Q3 Q7 Q7 Q8			2SC1740S(Q,R) 2SC3311A(Q,R) 2SC1740S(Q,R) 2SC3311A(Q,R) 2SC1845(F,E)	TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR		
Q9 Q9 Q101 Q101 Q102-104		*	2SC1740S(Q,R) 2SC3311A(Q,R) 2SC1740S(Q,R) 2SC3311A(Q,R) 2SA1309A(Q,R)	TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR		
Q102-104 Q105,106 Q105,106 Q110 Q110		*	2SA933S(Q,R) 2SC1740S(Q,R) 2SC3311A(Q,R) 2SA1309A(Q,R) 2SA933S(Q,R)	TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR		

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参照番号	位置	Parts 新		品	番号		部	品	名/規	格		marks 備考
9202 9202 9203 9203 9301,302		*	2SA13 2SA93 2SC17 2SC33 2SD13	3S(0 40S(11A(Q,R) (Q,R) (Q,R)		TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR					
Q303 Q303 Q304 Q305 Q305		*	2SA13 2SA93 2SC20 2SC17 2SC33	35(0 03(l 405(Q,R) _,K) (Q,R)		TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR					
Q306 Q307 Q307 Q308 Q308		*	2SD12 2SA13 2SA93 2SC17 2SC33	09A(3S(40S((Q,R) Q,R) (Q,R)		TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR					
620	2B		W02-1				FM FRONT-EN				NOT MA	DE;
KT-1030L T	UNER U	INIT	(X05-4			, X	05-4052-71: CERAMIC		XU5-4U4 0.010UF	2-71: E (FRA Z	INCE IVIA	עב)
C5 C6 ,7 C8 C9			CE04K CK45F CE04K CC45F	W1C4 F1H1 W1HF	170M 103Z R47M		ELECTRO CERAMIC ELECTRO CERAMIC		47UF 0.010UF 0.47UF 100PF	16WV Z 50WV J		
C10 C11 C12 C13 C14 ,15			CE04K CE04K CK45F CQ92F CK45F	W1H3 F1H1 M1H1	BR3M 103Z 153J		ELECTRO ELECTRO CERAMIC MYLAR CERAMIC	1	2.2UF 3.3UF 0.010UF 0.015UF 0.022UF	50WV 50WV Z J Z		
C16 C17 C18 C20 C21			CE04KI CK45FI CE04KI CE04KI	F1H2 W1V1 W1V1	223Z 100M 100M		ELECTRO CERAMIC ELECTRO ELECTRO ELECTRO		4.7UF 0.022UF 10UF 10UF 10UF	35WV Z 35WV 35WV 16WV		
C22 C23 C24 C25 ,26 C27 ,28			CK45FI CF92F CC93FC CK45FI CQ92FI	V1H4 CH1H B1H1	173J 1471J .02K		CERAMIC MF CERAMIC CERAMIC MYLAR	(470PF 0.047UF 470PF 1000PF 4700PF	K J K J		
C29 ,30 C31 C32 C33 C34			CE04K CK45FI CE04K CE04K	F1H1 W1HF W1H3	.03Z R47M BR3M		ELECTRO CERAMIC ELECTRO ELECTRO ELECTRO	(2.2UF 0.010UF 0.47UF 3.3UF 2.2UF	50WV Z 50WV 50WV 50WV		
C35 C36 C37 C38 C39		*	CK45FI CQ92FI CQ92FI CC45FI CC45FI	M1H1 M1H1 SL1H	.52J .32J 1121J		CERAMIC MYLAR MYLAR CERAMIC CERAMIC		470PF 1500PF 1300PF 120PF 270PF]] K		
C40 C41 ,42 C43 -45 C46 ,47 C48			CC45F CC45F CK45F CK45F CQ92F	CH1F B1H4 F1H1	1220J 171K 103Z		CERAMIC CERAMIC CERAMIC CERAMIC MYLAR		220PF 22PF 470PF 0.010UF 0.022UF	J J K Z J		
C49 C50			C90-1 CE04K				NP-ELEC ELECTRO		1 UF 4 7 UF	50WV 16WV		

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参照番号	位 置	Parts 新	部	品質	号	部品	13 名/規	格		marks 備考
C51 C52 C53 ,54 C56 C87			CE04K CE04K CE04K CC45F CK45F	W1A47 W1C22 SL1H2	70M 20M 220J	ELECTRO ELECTRO ELECTRO CERAMIC CERAMIC	1.0UF 47UF 22UF 22PF 0.010UF	50WV 10WV 16WV J Z		
C106 C107,108 C109,110 C111-113 C114			CE04K CK45F C91-0 CK45F C91-0	F1H22 085÷0 F1H22	23Z 05 23Z	ELECTRO CERAMIC CERAMIC CERAMIC CERAMIC	47UF 0.022UF 0.022UF 0.022UF 0.022UF	16WV Z N Z N		
C170 C171 C203 C204 C205			C91-0' C91-0' CE04KI CE04KI CK45FI	737-0 W1H2F W0J47)5 R2M 71M	CERAMIC CERAMIC ELECTRO ELECTRO CERAMIC	100PF 47PF 2.2UF 470UF 0.022UF	K J 50WV 6.3WV Z		
C207 C208 C213 C214 C215			CE04KI C90-13 CF92FI CE04KI CE04KI	332-0 /1H10 /1C22)5)4J 20M	ELECTRO NP-ELEC MF ELECTRO ELECTRO	2200UF 10UF 0.10UF 22UF 10UF	6.3WV 25WV J 16WV 35WV		
C218 C219 C235 C302 C303			CK45FE CE04KV CK45FE CE04KV CE04DV	V1V10 F1H22 V1V4R	10M 13Z 17M	CERAMIC ELECTRO CERAMIC ELECTRO ELECTRO	0.010UF 10UF 0.022UF 4.7UF 470UF	Z 35WV Z 35WV 16WV		
C304 C305 C306 C307,308 C309			CEO4KV CEO4KV CEO4KV CK45FF CEO4KV	/1H01 /0J47 :1H10	OM 1M 3Z	ELECTRO ELECTRO ELECTRO CERAMIC ELECTRO	220UF 1.0UF 470UF 0.010UF 330UF	25WV 50WV 6.3WV Z 50WV		
C310 C312 C315,316 C317 C318,319			CE04KW CE04KW C91-07 CK45FF C91-07	11E10 149-0 1H10	2M 5 3Z	ELECTRO ELECTRO CERAMIC CERAMIC CERAMIC	100UF 1000UF 220PF 0.010UF 220PF	25WV 25WV K Z K		
C320 C321 C324			CEO4KW CEO4KW CK45FF	1E10	1 M	ELECTRO ELECTRO CERAMIC	10UF 100UF 0.010UF	35WV 25WV Z		
J1 J2 J3 J302 J303	2B 2B 2B 2A 2A		E20-03 E13-02 E11-01 E03-01	35-0 88-0 08-0	5 5 5	LOCK TERMINAL PHONO JACK MINIATURE PHO AC OUTLET AC OUTLET	(OUTPUT)	E T	
CF1 ,2 CF4 L1 L2 L3			L72-05 L72-00 L30-04 L30-04 L40-10	96-0 88-0 84-0	5 5 5	CERAMIC FILTE CERAMIC FILTE AM IFT FM IFT SMALL FIXED	ER	1.0mH,K)		
L4 L4 L5 L5 L6 ,7		*	L40-56 L40-56 L40-68 L40-68 L79-07	25-2 25-2 25-2	9 0 9	SMALL FIXED DESTRUCTION OF THE PROPERTY OF T	INDUCTOR (INDUCTOR (5.6mH,J) 6.8mH,J)		
L8			L40-10	91-1	7	SMALL FIXED	INDUCTOR(1uH)		

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	L9 L104 L105 L106 L201			L30-0485-05 L39-0195-05 L39-0192-05 L40-1091-17 L40-1091-17	FM IFT COMBINATION COIL COMBINATION COIL SMALL FIXED INDUCTOR(1uH) SMALL FIXED INDUCTOR(1uH)	
Δ	T301 X1 X201 X201	28	*	L07-0249-05 L77-1122-05 L78-0209-05 L78-0218-05	POWER TRANSFORMER CRYSTAL RESONATOR(7.2MHz) RESONATOR (4.194MHZ) RESONATOR (4.194MHz)	
	CP201 CP202 CP203 CP204 CP205			R90-0832-05 R90-0487-05 R90-0804-05 R90-0850-05 R90-0809-05	MULTI-COMP 4.7KX3 J 1/6W MULTI-COMP 47KX4 J 1/6W MULTI-COMP 47KX8 J 1/4W MULTIPLE RESISTOR 100KX3 MULTIPLE RESISTOR 10KX4	
	CP206 R53 R318 R319 R323			R90-0855-05 RS14KB3D221J RS14KB3D121J RS14KB3A820J RS14KB3A221J	MULTI-COMP 100KX5 J FL-PROOF RS 220 J 2W FL-PROOF RS 120 J 2W FL-PROOF RS 82 J 1W FL-PROOF RS 220 J 1W	
	R324 R329 VR1 VR2 VR3		*	RS14KB3A222J RS14KB3D102J R12-3688-05 R12-1619-05 R12-3686-05	FL-PROOF RS 2.2K J 1W FL-PROOF RS 1.0K J 2W TRIMMING POT(47K)FM TUNE LEVEL TRIMMING POT(4.7K)VCO TRIMMING POT(22K)AM TUNE LEVEL	
	VR4		*	R12-5652-05	TRIMMING POT(220K)SEPARATION	
	S201-217 S219	2B 2A		S40-1064-05 S40-1064-05	PUSH SWITCH PUSH SWITCH (POWER)	
	D1 ,2 D1 ,2 D1 ,2 D3 D3			HSS104 1N4148 1SS133 BZX55-C5V1 HZS5.1N(B2)	DIODE DIODE DIODE ZENER DIODE ZENER DIODE	F
	D3 D4 -7 D4 -7 D4 -7 D109-116			RD5.1ES(B2) HSS104 1N4148 1SS133 HSS104	ZENER DIODE DIODE DIODE DIODE DIODE	F
	D109-116 D109-116 D201,202 D201,202 D201,202			1N4148 1SS133 HSS104 1N4148 1SS133	DIODE DIODE DIODE DIODE DIODE	F
	D203 D203 D203 D204-210 D204-210			BZX55-C3V9 HZS3.9N(B2) RD3.9ES(B2) HSS104 1N4148	ZENER DIODE ZENER DIODE ZENER DIODE DIODE DIODE	F
	D204-210 D213-218 D213-218 D213-218 D220			1SS133 HSS104 1N4148 1SS133 BZX55-C5V1	DIODE DIODE DIODE DIODE ZENER DIODE	F F
	D220			HZS5.1N(B2)	ZENER DIODE	_

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D220 D221 D221 D221 D223-226			RD5.1ES(B2) HSS104 1N4148 1SS133 HSS104	ZENER DIODE DIODE DIODE DIODE DIODE		F
D223-226 D223-226 D301 D301 D301			1N4148 1SS133 BZX55-C3V3 HZS3.3N(B2) RD3.3ES(B2)	DIODE DIODE ZENER DIODE ZENER DIODE ZENER DIODE ZENER DIODE		F
D302 D302 D302 D303 D303		*	BZX55-C2V7 HZS2.7N(B2) RD2.7ES(B2) BZX55-C13 HZS13N(B2)	ZENER DIODE ZENER DIODE ZENER DIODE DIODE ZENER DIODE		F
D303 D304,305 D304,305 D309,310 D309,310			RD13ES(B2) HSS104A 1SS131 S5688B 1N4004	ZENER DIODE DIODE DIODE DIODE DIODE		F
D309,310 D313-317 D313-317 D313-317 FL201	2A	*	1SR139-100 HSS104 1N4148 1SS133 CF1022C	DIODE DIODE DIODE DIODE DIODE FLUORESCENT INDICATOR TUBE		F
IC1 IC2 IC3 IC201 IC202		*	LA1266 AN7470 LM7001 CXP5016-532S BA10393	IC(AM/FM IF) IC(FM MPX) IC(PLL FREQUENCY SYNTHESIZER) IC(4BIT MICROCONPUTER) IC(DUAL COMPALATOR)		
IC203 IC204 IC205 Q1 Q2			LB1433N M5223P NJM78L05A 2SC1923(R,0) 2SC1845(F,E)	IC(LEVEL METER DRIVER) IC(OP AMP X2) IC(VOLTAGE REGULATOR/ +5V) TRANSISTOR TRANSISTOR		F
Q3 ,4 Q3 ,4 Q3 ,4 Q5 Q5			JC501(P,Q) 2SC1740S(Q,R) 2SC2458(Y,GR) 2SK163(L,M) 2SK364(GR,BL)	TRANSISTOR TRANSISTOR TRANSISTOR FET FET		F
Q101 Q101 Q101 Q102-104 Q102-104			JC501(P,Q) 2SC1740S(Q,R) 2SC2458(Y,GR) JA101(P,Q) 2SA1048(Y,GR)	TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR		F
Q102-104 Q105,106 Q105,106 Q105,106 Q105,106 Q203,204			2SA933S(Q,R) JC501(P,Q) 2SC1740S(Q,R) 2SC2458(Y,GR) JC501(P,Q)	TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR		F
Q203,204 Q203,204 Q211-215 Q211-215 Q211-215		*	2SC1740S(Q,R) 2SC2458(Y,GR) DTA124ES RN2203 UN4112	TRANSISTOR TRANSISTOR DIGITAL TRANSISTOR TRANSISTOR TRANSISTOR		F

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Q301,302 Q303 Q303 Q303 Q304		2SD1302(S,T) JA101(P,Q) 2SA1048(Y,GR) 2SA933S(Q,R) 2SC2003(L,K)	TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR		F
9305 9305 9305 9306 9307		JC501(P,Q) 2SC1740S(Q,R) 2SC2458(Y,GR) 2SD1266(Q,P) JA101(P,Q)	TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR		F
Q307 Q307 Q308 Q308 Q308		2SA1048(Y,GR) 2SA933S(Q,R) JC501(P,Q) 2SC1740S(Q,R) 2SC2458(Y,GR)	TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR TRANSISTOR		F
620	2B	W02-1041-05	FM FRONT-END ASSY		
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SPECIFICATIONS

KT-1030L

KT-591/591S FM tuner section **MONO** 0.4% **STEREO** 0.5% Signal to Noise ratio (at 1 kHz, 65 dBf input) STEREO Stereo separation Alternate channel selectivity (±400 kHz) 50 dB Frequency response (30 Hz-15 kHz) + 0.5 dB, -2 dB Output level/Impedance AM tuner section Tuning frequency range 530 kHz-1,610 kHz 10 kHz step 10 kHz step (U.S. and Canada) 530 kHz-1,700 kHz Signal to noise ratio Output level/Impedance **KT-591S** only Tuning frequency range **10 kHz step** 530 kHz-1,610 kHz SW Tuning frequency range **SW1** 3.2 MHz-7.3 MHz General Power consumption 10 W **AC** outlet For U.S.A. and Canada For U.S military For other countries

H: 75 mm (2-15/16") D: 264 mm (10-1/2")

FM tuner section	
Tuning frequency range	87.5 MHz-108 MHz
Usable sensitivity (DIN at 75)	
MONO	
STEREO	
Total harmonic distortion (DIN at 1 kHz 65	
MONO	
STEREO	
Signal to noise ratio (DIN weighted at 1 kl	
MONOSTEREO	
Stereo separation (DIN)	63 at
1 kHz	40 de
Selectivity	40 UE
(DIN ±300 kHz)	64 dB
Frequency response	
(30 Hz-15 kHz)	+05dB -2dB
Output level/Impedance	
(at 1 kHz, 75 kHz dev.)	0.6 V/3.3 kΩ)
MW tuner section	
Tuning frequency range	
Usable sensitivity	13 µV/(400 µV/m)
Signal to noise ratio	
(at 30% mod. 1 mV input)	
Total harmonic distortion	0.5%
IM Torres Oracles	
LW Tuner Section Tuning frequency range	152 11- 001 11-
Usable sensitivity	
Signal to noise ratio	22 μν
(at 30% mod. 1 mV input)	47 dB
Total harmonic distortion	
Output level/Impedance	0.070
(at 30% mod. 1 mV input)	0.18 V/3.3 kΩ
,,	
General	
Power consumption	10 W
AC outlet	
UNSWITCHED	
Dimensions	W: 440 mm
	H: 80 mm
	D : 264 mm
Weight (Net)	2.6 kg

KENWOOD follows a policy of continuous advancements in development. For this reason specifications may be changed

KENWOOD poursuit une politique de progrès constants en ce qui concerne le développement. Pour cette raison, les spécifications sont sujettes à modifications sans préavis.

KENWOOD strebt ständige, Verbesserungen in der Entwicklung an. Daher bleiben Änderungen der technischen Daten jederzeit vorbehalten.

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